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# OUTDOOR EDUCATION



*Patrick and Leah taking a break from canoeing, Katherine Gorge, Northern Territory*

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# Editorial

*John Quay*

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Welcome to volume 18 of the *Australian Journal of Outdoor Education*. May I introduce myself as the new editor of the journal, and at the same time thank Robyn Zink for her work as editor over the last four years. In this issue are four refereed papers, one non-refereed paper, and a book review. Thank you to the reviewers who have been involved with the development of these papers.

Two of the refereed papers highlight concerns with decision making in our field, both theoretically and in practice. Decision making brings with it high levels of complexity, which require theoretical consideration of practical instances in order to advance both theoretical and practical understanding. Mike Boyes and Tom Potter investigate decisions made by experienced outdoor leaders during bushwalking expeditions in the Southern Alps of New Zealand. They consider this context one of Naturalistic Decision Making (NDM), which can be understood in light of the concept of Recognition-Primed Decisions (RPD). A major contribution of this empirical work is the categorisation of decision situations into a taxonomy relevant to outdoor education.

Sean Murray is also concerned with decision making, but this time as applied in the area of risk management planning, raising questions about the breadth of application of recommendations made by the Queensland Coroner in connection with commercial rafting participant fatalities. Again, the complexity of decision-making processes is highlighted in the realm of safety in outdoor adventure activities, but the differences between commercial and educational operations are foregrounded as key to these processes. Ignoring them brings with it other risks.

The refereed paper by Beau Miles and Brian Watchow draws attention to the culturally and textually constructed nature of adventure. Employing sea kayaking as an empirical frame of reference, the issue of how adventure is presented narratively brings to light not only the more obvious external features of an adventure, but perhaps more importantly the internal — enabling a window into understandings of self, identity and meaning making. Both internal and external are co-constitutive of these meaning-making journeys, some of which reach to the extremes of human experience.

The other refereed paper is from Paul Stuhr, Sue Sutherland, Jim Ressler and Esther Ortiz-Stuhr, and continues the theme of adventure by examining the impact on relationship skills of an Adventure-based Learning (ABL) unit of instruction within physical education. This investigation involved a qualitative case study that drew on middle school students' perceptions of this ABL unit in connection with their intrapersonal and interpersonal relationship skills. Findings suggest that students were capable of connecting with, valuing, developing, and transferring relationship skills learnt during the ABL unit.

The non-refereed paper offers an insightful excursion through the nutritional potentialities of including wild foods in our diet. David Kowalewski perceives the lack of success sometimes attributed to the regular ways in which we promote conservation and so takes a more novel approach — through nutrition — arguing that the nutritional benefits of wild foods is a further reason for valuing wilderness.

The book review in this issue features *Tall Ships Today: Their Remarkable Story*, authored by Nigel Rowe, Ron Dadswell, Colin Mudie and Michael Rauworth, with a Preface by HRH The Duke of Edinburgh and published by Adlard Coles Nautical, Bloomsbury. The review was conducted by Pete Allison and highlights the role that tall ships have played in historical terms and also today in sail training. The book appeals to a variety of audiences, amongst whom academics feature prominently.

The journal has now been in continuous operation since volume 1 appeared in 1995. Over these years the journal has contributed to informing a wide professional audience by providing an outlet for research and scholarship in outdoor education. The aim is to continue this tradition. However, there is a change which will ensue with the next volume, which also marks the journal's twenty-first year.

The next volume will involve a change in name to the *Journal of Outdoor and Environmental Education*. This brings the journal into line with other major journals in this field, including the *Journal of Adventure Education and Outdoor Learning* based in the UK, and the *Journal of Experiential Education* and the *Journal of Outdoor Recreation, Education and Leadership* in the USA. It is generally understood that these journals originate in particular locations, but they do not wear this location in their titles, meaning that they appeal more directly to an international audience of contributors and readers.

In addition, the *Journal of Outdoor and Environmental Education* expresses a content niche amongst these journals in more specifically catering to research and scholarship that embraces environmental education aspects of outdoor education, while not excluding papers from adventure education, experiential education or outdoor recreation. A further benefit of the name change is that it does not obviously exclude colleagues in New Zealand. To mark this change there will be a special issue released in the next volume, during 2016.



John Quay, Ph.D  
Editor

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# The application of recognition-primed decision theory to decisions made in an outdoor education context

*Mike Boyes and Tom Potter*

*University of Otago, Lakehead University*

## Abstract

This research examined the decisions that highly experienced outdoor leaders made on backpacking expeditions conducted by a tertiary institution in the Southern Alps of New Zealand. The purpose of the research was to document decision problems and explore them as Recognition-Primed Decisions (RPD) within naturalistic decision making (NDM) contexts. Data were obtained through critical decision method interviews to generate retrospective verbal protocols. The data generated decision situations that were categorised into taxonomies consisting of five themes: logistical, safety, pedagogical, environmental and group dynamics. Across the themes, the defining features of outdoor education situations were teaching and learning processes where decisions were made, modelled and practised. The decisions were analysed with the RPD model. Some were straightforward and relied on the experience based intuitive recognition of the leader for fast resolution. Others required more analysis to better understand the situation or deeper consideration of the options available, and in some cases both. Many field-based decisions were underpinned by prior departmental planning processes. Experience and planning supported recognition of the teachable moment particularly in pedagogical and environmental decisions. Consistent with the RPD model, intuitive judgements arose from experience and intuition was based on recognition. The research applies RPD into outdoor pedagogical situations and identifies the unique decision features of the outdoor education context.

Keywords: outdoor leadership, recognition-primed decision making, outdoor education

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## Introduction

Outdoor leaders take people into the outdoors in a myriad of ways. Included are activities such as rock-climbing, kayaking and mountain biking, through diverse domains such as outdoor education, adventure tourism, and club trips. Much of the learning and welfare of group members are in the leader's hands. There is widespread agreement that outdoor programme implementation relies on effective decision making (DM) (Martin, Cashel, Wagstaff & Breunig, 2006; Shooter & Furman, 2011).

It is well recognised that the outdoors is a complex and dynamic decision-making environment (Galloway, 2002; Martin, Schmid & Parker, 2009; Tozer, Fazey & Fazey, 2007). The natural environment has intrinsic elements of risk and uncontrolled variables presented by elements such as weather, height, water and speed (New Zealand Department of Labour, 2010). Adding to this complexity is the uniqueness of individuals and the dynamics of groups. Decision circumstances for outdoor leaders vary greatly, with some situations pressured and changeable and others stable and consistent. The dynamic interactions between and among participants, leaders and the environment means that leaders of outdoor activities make countless decisions during an excursion.

Examples of outdoor decisions include: (a) place (e.g., where to camp); (b) time (e.g., when to stop for lunch); (c) the needs of individuals (e.g., comfort, safety); and (d) the group process (e.g., is everyone happy). Depending on context, these could be simple or complex decision situations that affect the quality of an adventure experience and the safety of participants

(e.g., to cross a river or not, and if so, where, how and when). Consequently, the importance of leader decisions varies from inconsequential to paramount. Drury, Bonney, Berman and Wagstaff (2005) proposed a classification of decisions on a continuum from simple to complex (see also Martin et al, 2006). Here, decisions could be classified depending on a combination of contextual factors including degrees of challenge, uncertainty, predictability of outcome, time pressure, threat, emotionality and situational understanding. Consideration of these arrays appears in several text books (see Drury et al., 2005; Martin et al., 2006; Priest & Gass, 2005).

Some empirical research has been conducted to explore different outdoor decision situations. These include: outdoor pursuits leaders (Beare & Lynch, 2005); outdoor education leaders (Boyes & O'Hare, 2003); medical decision making by Outward Bound staff (Galloway, 2007); and outdoor leaders on a Wilderness Education Association course (Martin et al., 2009). Their decision problems include emergency situations such as hypothermia, a lost person, and a spinal injury, as well as whether to cross an alpine pass and a river. Also included are decisions about extending a cross country ski trip to increase the level of challenge. Despite the universality of decisions, researchers have yet to develop a taxonomy of outdoor leadership decisions based on empirical evidence. A deeper understanding would be useful as a basis for understanding more about how different contexts and levels of complexity influence decision processes. The implications of this approach may be useful to inform the education of new and existing leaders and contribute to better practice. The present research explores the range of

# The mirror of the sea: Narrative identity, sea kayak adventuring and implications for outdoor adventure education

*Beau Miles and Brian Wattchow*

*Monash University*

## Abstract

This paper explores the complex and changing nature of adventure as a form of cultural practice. Borrowing from Joseph Conrad's memoirs *The Mirror of The Sea* (1907), sea kayaking is contextualized here as a journey that takes place just as much between 'landfall and departure' as it does between the paddler's ears (i.e., in the paddler's mind). That is to say, to gain useful insights into the experience of sea kayaking it is necessary to consider both the external and internal journey of the paddler, and the relationship that exists between these two phenomena. Using tenets of personality psychology which presents new ways of understanding narrative identity, we will 'waymark' textual vignettes from four modern day sea kayaking adventure narratives to explore ideas of self, narrative identity and meaning making. These key passages aim to reveal how the adventurer's story is influenced by "external factors that shape the public expression of stories about the self" (McAdams & McLean, 2013, p. 233). Summary discussion will address potential implications for contemporary outdoor adventure education, offering a way of stimulating reflective practice about the culturally and textually constructed nature of adventure.

Keywords: narrative identity, outdoor adventure education, meaning making, critically reflective practice

## Introduction

People and cultures are drawn to the idea of adventure through adventure stories. From the mythological trials of Odysseus to recent autobiographical stories about the exploration of summits, oceans and poles, heroes and antiheroes depart from familiar homelands, overcome challenges, have their epiphanies in the wilderness, and return to society as changed people. Or so it is written. According to Goodnow (2008) their stories constitute and conform to a quest narrative. For both adventurer and reader the attraction of the genre is that both may gain insights into geographically distant places and cultures explored, and the equally remote inner terrain of the adventurer's psyche.

Waves and rollers, storms and winds, rock and mountains are teachers in two senses, in so far as they teach the adventurers something about the obstructive nature of the world and something about their own attitude towards them, and both—the adventurers themselves and their understanding and knowledge—are changed in the process. (Becker, 2007 p. 83)

Whilst Hillary famously pursued the summit of Mt. Everest 'to knock the bastard off' and his predecessor Mallory, 'because it was there', the motivations of the reader may be equally ambiguous: "yielding helplessly to the suction of story ... we just can't resist the gravity of alternate worlds" (Gottschall, 2012, p. 3). The telling of the tale, one might argue, can reveal as much about the reader as the writer;

a narrative where reading about action and action itself become aligned. Zweig (1974) argues that this collective conscience about adventure may be

... taken from a novel, a television serial, a science-fiction story. It would have been harder to have taken it from my own life because adventures are precisely what few of us know from experience. Our familiarity with them tends to be literary. (p. 3)

Yet few publications, scholarly or otherwise, have critically reflected upon what the adventure narrative looks and reads like in relation to influencing, or being influenced by, culture. Zweig's (1974) *The Adventurer*, is one of the few insightful and academic representations of 'adventure as culture,' in which the author explores "the oldest, most persistent subject matter in the world" (p. 6). Nerlich (1987) proposed an 'ideology of adventure' where adventure and modernity (and the adventurer's narrative) are inextricably linked in the development of Western culture. In the preface to *The Ideology of Adventure: Studies in Modern Consciousness 1100–1750*, Nerlich stated that, "writing about adventure is to venture in writing" (1987, p. xix).

There are a small number of notable publications that embark on a cultural understanding of particular forms of adventure. Noyce's *Scholar Mountaineers* (1950) and later Macfarlane's (2003) *Mountains of the Mind* (see also Fleming, 2001, *Killing Dragons: The Conquest of the Alps*) signpost a need for gathering deeper insights into the unique ways humans travel and write when they adventure. These works gesture at the reciprocal nature of adventure, culture and

# Students' perception of relationship skills during an adventure-based learning unit within physical education

Paul T. Stuhr<sup>1</sup>, Sue Sutherland<sup>2</sup>, James Ressler<sup>3</sup> and Esther M. Ortiz-Stuhr<sup>1</sup>

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## Abstract

Adventure-based learning (ABL) is a sequenced curriculum using structured physical and teambuilding activities that create the space for participants to work on group communication, cooperation, trust, and problem solving. Reflection (i.e., debriefing) is an essential aspect of the ABL curriculum (Cosgriff, 2000). A debrief in ABL is the reflective component that provides opportunity for students to construct meaning from the activities through student-centred discussion. Physical education (PE) teachers can use ABL to promote intrapersonal and interpersonal relationship skills (IIRS) in an effort to establish community within the classroom (Dyson & Sutherland, 2014; Sutherland & Stuhr, 2014). The purpose of this qualitative case study was to investigate middle school students' perceptions of their IIRS while involved in a 15-lesson ABL unit of instruction during PE. Four themes developed from the data, with each theme representing a learning outcome stage: connecting to the ABL activities, valuing IIRS worked on in the ABL activities, developing IIRS within PE, and transferring IIRS outside the classroom. The ABL curriculum used within this PE setting produced student outcomes associated with IIRS necessary to function effectively in society. The findings indicated that the students were able to *connect with, value, develop, and even transfer* IIRS that were taught during the ABL unit. This study demonstrated that an ABL curriculum could produce student-learning outcomes that promote social and emotional learning.

Key words: adventure learning, neurobiological lens, brain resilience, scientific platform, psycho-social equilibrium

Adventure-based Learning (ABL) is a sequence of highly structured physical activities and periods of reflection (i.e., debriefs) with the aim to promote personal and social development (Cosgriff, 2000). ABL has been used as a synonym in describing Adventure Education or adventure programming conducted within physical education (PE) programmes (Dyson & Sutherland, 2014). ABL has been shown to have a positive effect on intrapersonal and interpersonal relationship skills (IIRS) amongst students, such as enhanced leadership skills, patience, and working with others (Passarelli, Hall, & Anderson, 2010; Quezada & Christopherson, 2005). Adventure youth camps have also shown positive results in regard to promoting IIRS (e.g., improving self-esteem and friendship) among adolescent populations (Thurber, Scanlin, Scheuler, & Henderson, 2007). Within PE settings ABL has the potential to help students develop IIRS (Cosgriff, 2000; Dyson, 1995; Sutherland & Stuhr, 2014), yet our knowledge regarding student outcomes from ABL within structured PE is limited, reflecting a paucity of research in this area. This qualitative case study aimed to narrow this research gap through an investigation of middle school students' perceptions of their IIRS while involved in a 15-lesson ABL unit of instruction during PE.

## Conceptual framework

The social emotional learning (SEL) literature was used to help frame this study and as a means to connect the importance of using ABL to promote IIRS. According to the Collaborative for Academic, Social,

and Emotional Learning (CASEL), SEL is the ability to problem solve, make responsible decisions, manage one's emotions, and build positive relationships with others (Collaborative for Academic, Social, and Emotional Learning, 2013). The study of SEL has risen since the 1990s and as such, many researchers believe SEL should be an integral part of the educational experience provided to our youth (Hoffman, 2009).

The primary reason to teach and promote inclusion of SEL experiences within school is to help students acquire social skills (Cohen, 2006). SEL also plays a role in student academic success (Elias, Zins, Graczyk, & Weissberg, 2003). Specifically, CASEL has successfully examined and found advantages of using evidence-based SEL programmes to promote academic success within schools (CASEL, 2013). SEL instruction has also had positive effects on health, citizenship, IIRS, and improved happiness (Zins & Elias, 2006).

## Why use SEL to frame a study in ABL?

There are similarities between the use of an ABL curriculum and SEL instruction that provide sound rationale for using the latter to frame this study. Studying ABL outcomes through the lens of SEL is supported by commonalities between these two types of programming. For example, the philosophical foundation of ABL is predicated on students learning how to develop community, cooperation, trust, and problem solving abilities (Frank, 2013), a commonality shared, and proven to be enhanced through SEL instruction (Zins & Elias, 2006). ABL and SEL

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# The development of a white water rafting code of practice in response to multiple fatalities in Queensland: How will it impact the commercial and educational sector?

*Sean Murray*

*La Trobe University, Bendigo*

## Abstract

In this article I review lessons to be learned from five commercial rafting participant fatalities in Northern Queensland between 2007 and 2009, and examine some implications of the coroner's recommendations from an outdoor education perspective. I aim both to help prevent future fatalities and to contribute to discussion about how best to achieve that. In particular, I examine the merits and potential limitations of the development of risk management plans for each rapid, which the coroner recommended as part of an industry code of practice. I consider both the importance of knowing and responding to specific hazards and drawbacks to existing attempts to frame safety around risk management documentation approaches developed for other industries. I argue there is potential for insufficiently thought through approaches to embedding knowledge of specific hazards in practice to be adopted not only in Queensland commercial rafting but across the board in the outdoor education field. As a contribution to needed discussion about how to approach safety management, I explain how alternative aims and purposes for educational rafting journeys can help to reframe how safety management is understood.

Keywords: commercial rafting, educational rafting, rafting fatalities, risk management, journey based outdoor education

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## Introduction

Between July 2007 and February 2009 there were five fatalities in commercial rafting operations in North Queensland: four from rafting incidents on the Tully river and one from a sports rafting incident on the Russell river. In reviewing each case separately and a subsequent joint hearing, the Coroner (Kevin Priestly) made recommendations for significant changes to the approach toward risk assessments performed by the Queensland commercial rafting industry. The Coroner recommended that a code of practice that includes safe operational procedures specific to each set of rapids be developed under the Safety in Recreational Water Activities Act 2011. It was suggested that each rapid should be assessed to: identify the location of potential entrapment points; assess the prospect of a flip or other event that might result in a rafter or rafters entering the water; assess the prospect of rafters in the water passing near an entrapment point; assess the extent to which the placement of guides in available cover positions will mitigate the risk of entrapment and; consider the availability and mix of other risk controls that might be used. This is despite the evidence given by many river guides to the inquest that the river is a dynamic body of water and the question of how best to navigate a particular section on a particular day was best left to the individual guide (Priestly, 2012).

In this paper I critically examine the proposed code of practice in relation to rafting safety and in relation to the existing model of risk management it uses as a foundation. In particular I examine the relevance of the code of practice designed for the commercial context if it begins to be adopted by the educational context through state adventure activities standards. I suggest that certain offerings of rafting

journeys in an educational context have different aims from commercial undertakings, such as not seeking risk, travelling slowly and making deliberate on-site assessments as part of the program, and therefore should not be bound to the same protocols.

## The incidents and the coronial findings

The following sections summarise the findings and lessons that can be learned from the coroner's reports. It is important to note from the outset that scrutinising these incidents is for the purpose of vicarious learning and to illustrate the findings of the coroner that have led to the subsequent recommendations. I am in no way passing judgement with the benefit of hindsight on the actions of management or those at the scene. Indeed it is my anecdotal understanding that on the whole the rafting companies involved are all professional operations that model safe practice, purchase and maintain good equipment, and have developed quality training courses. They employ experienced guides and ensure that these guides are familiarised with the river before they are in charge of guiding their own raft. The key aspects of the incidents are described in Table 1.

## Findings of coronial inquest

For each inquest, the coroner reviewed the adequacy of the available control measures relied upon by the operators to manage safety. He found the relevant hazard in all cases was entrapment. He identified the pre-conditions for entrapment as well as the variables relevant to those pre-conditions, and considered available risk controls that might be used to intervene and influence the pre-conditions. The risk controls identified are listed in Table 2.

# Why save wilderness? — Fruits and veggies!

David Kowalewski

Alfred University

## Abstract

Why save wilderness? Environmental educators usually offer ecosystemic and aesthetic reasons, yet clearly this abstract approach has failed to resonate with the wider public. In this article I adopt a nutritional strategy based on a broad array of sources. Wild plant food, in terms of economics, ubiquity, and other measures, performs very well compared with supermarket competitors. This pragmatic method, I've found, offers a far more attractive and therefore popular grounding for appreciating wilderness than does highly theoretical argumentation.

Keywords: wilderness, wild edible plants, wild medicinal plants

"A weed is a wonderful plant that stubbornly refuses to grow in a straight line." — Herbalist saying

"God didn't give Adam and Eve a convenience store. He gave them a Garden of Eden." — Jackie Clay (2009, p. 8)

Why save wilderness? Most environmentalists give abstract ecosystemic and aesthetic reasons, yet this approach has yet to garner mass public support. 'To eat' is my personal response, since not only did our ancestors for millennia feel this way, but the reason may be more relevant than ever.

My students are amenable to this idea, yet backing up the claim with facts is no mean task. Whereas information galore is available on supermarket fare, wild food is largely ignored. This article provides basic information on wild edible plants — traditionally the most vital food source for humans — from a wealth of sources, in order to give environmental teachers and others data from the other side of the food story.

## Civilized hype

Despite its self-congratulatory propaganda, civilization is at the least a mixed bag. Domestication of the wild, certainly the greatest revolution in our human story, is viewed by many cultures as a loss of power, the truly 'original sin,' a 'fall,' an expulsion from the Garden of Eden — *Paradise Lost*.

Indeed domestication, the master process of civilization, to some scholars has led to a biological new species. Sedentism, diet change, living in a built environment, and other changes have produced a sorry creature — *Homo domesticus* — who has become less aware and more docile (like domestic pets) and who displays juvenile behavior in adulthood. To some wags, people have become 'sheeple.' In fact, domestication may be the major cause of today's chronic health problems — it de-powers us (Leach, 2003).

Civilization, indeed, has waged a relentless war against what has always stubbornly resisted its control — the wild. Bureaucratic religion has played a major role, with its fear-mongering about good and bad, which translates botanically into good plant (domestic crop) and bad plant ('weed') and reflects a judgementalism that simply feeds the 'good' ego (we) waging war against the 'bad' others (them).

Yet even the much maligned "invasive" plants, according to research, have innumerable healthful uses (Scott, 2010). For example, the infamous aquatic "pest," the water hyacinth, has edible leaves, petioles, and inflorescences (Couplan, 1998).

At the extreme, civilization exaggerates the dangers of 'bad poisonous' wild plants, comparing them with 'good non-poisonous' civilized ones, but failing to notice the ancient herbalist saying that 'the poison is in the dosage.' In fact, every single so-called "poisonous" wild plant has been used by some culture for a healthful purpose. Moreover, the number of people sickened by wild plants across the world pales to a tiny shadow compared with the tens of thousands killed by the tainted food and dangerous pills of civilization. Civilization's fear-mongering, however, does serve the profit needs of the makers of such products.

All this is not simply neo-romantic rhetoric. A good deal of evidence shows that wild and domesticated plants of the same species are different — wild ones have more power. Plant species in the wild, according to galvanometer readings, show higher levels of electromagnetic energy than their corresponding domesticates (Hall, 1998, pp. 17–18).

Too, agricultural vegetables and fruits have less phytonutrients than their wild ancestors (Philpott 2013; Robinson, 2014). This is hardly surprising, given agriculture's soil exhaustion, erosion, degradation, and poisoning with biocides. For example, for most medical afflictions, wild ginseng is more effective than its field-grown counterpart (Balch & Balch, 2000, p.

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# Tall Ships Today: Their Remarkable Story

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This book sets out to give insight into a fleet of around 100 sail training tall ships currently operating around the world and also to give a sense of what it is like to sail aboard one of these vessels. The book has four chapters: Origins and Evolution, The Tall Ships, The Tall Ship Experience and Racing on Tall Ships. The book has appeared with some anticipation and for good reason. The authors bring experience and insights into tall ship sailing (or sail training) that is unrivalled. My first impression of the book was one of quality in all respects. The quality is evident throughout in the writing, images and overall 'feel' of the book. The chapter sequence can be interpreted in two ways. Initially the chapters suggest a chronological approach or 'looking back to look forward' approach; but a second interpretation is that the central concerns are deliberately at the heart of the book: the ships and the value of the experiences aboard them. My inclination is that the latter interpretation was a conscious choice of the book's architect, editor and principal author Nigel Rowe who, together with the three contributing authors, have a clear vision of the value of sailing beyond learning to sail.

For good reasons this has been a challenging book to review. If the book were solely of interest to one discreet audience the review could be written with the audience in mind. However, the book has appeal to, among others, historians, sailing enthusiasts, educators, recreators and of course to academics. As I read through the book my mind wandered to consider both a nephew (10 years old) and an aging relative — both of whom I am confident would devour the book in their own ways!

Of course the current practices of sailing on tall ships in different parts of the world vary and the reasons for this are explored through Mudie's opening chapter on Origins and Evolution. This chapter does as the title suggests but adds much more to the book. It contains fascinating insights, such as how Greek ship builders place the bottom of the tree facing to the front of the vessel as the wood is stronger this way, or that some ship builders insisted on using only trees grown on particular hillsides (p. 22), practices which continue

to this day. This chapter appears at the beginning of the book and allows the reader to make sense of the whole book. It provides context and rationale for everything that follows. A point that is neatly summarised by Rauworth who identifies three important values of sailing ships as: historical/maritime heritage, training for a seafaring career and character development (p. 30). It is this last value which the majority of the book is concerned with.

The centre of the book (pp. 34–165) consists of a review of 105 different vessels from 38 countries providing a short narrative, brief specifications and images that are inspiring throughout. This provides a taster of the diversity of vessels involved in sail training and just enough to tease the reader to find out more (readily available on the internet via website addresses given in the book). For those not familiar with ship rigs there are fantastic line drawings (pp. 36–7) illustrating everything from a Gaff Cutter to a Four Mast Barque. Rauworth's introduction to this section offers a valuable overview in relation to the history and purposes of the ships featured.

To complement the obvious historical and aesthetic appeal of the ships the third chapter concentrates on the current day experiences of sailing aboard these vessels. Using a case study to provide a rich and nuanced visceral experience of a first time trainee, Rowe demonstrates a grasp of the depth of learning and profound influences sail training can have by noting towards the end

He began to think that perhaps the whole experience had, as his friend Paula back home had said it would, changed his life. Although it would be more accurate, he thought, to say it had given him the self assurance and ability to change his life himself — to be in the driving seat, to think differently and with broader horizons about what mattered to him as a person and what he wanted to do with his life. (p. 173)