

LIVERPOOL JOHN MOORES UNIVERSITY, FACULTY OF EDUCATION,  
HEALTH AND COMMUNITY, UK<sup>1</sup>  
PENNSYLVANIA STATE UNIVERSITY, COLLEGE OF HEALTH AND HUMAN  
DEVELOPMENT, USA<sup>2</sup>  
EDINBURGH UNIVERSITY, INSTITUTE FOR SPORT, PHYSICAL EDUCATION  
AND HEALTH SCIENCES, UK<sup>3</sup>

## **EXPLORING FACTORS INFLUENCING OUTCOMES OF A FIVE-WEEK YOUTH EXPEDITION IN THE HIMALAYAS USING THE SAIL TRAINING PROGRAMME SELF-ASSESSMENT TOOLKIT**

TIM STOTT<sup>1</sup>, PETE ALLISON<sup>2</sup>, KRIS VON WALD<sup>3</sup>, OMOLABAKE FAKUNLE<sup>3</sup>

### **ABSTRACT**

Much evidence to link youth expeditions and gap years with a range of outcome benefits for participants exists, but to date, there have been relatively few insights into what exactly brings about these reported outcomes. A modified version of the Sail Training Voyage Toolkit (2011) was used to evaluate outcomes of a five-week British Exploring Society youth expedition in the Himalayas. Data generated from 22 participants completing the modified Sail Training Voyage Feedback Form at the end of their expedition were complemented by data from 16 interviews conducted during weeks one, three and five of the expedition.

Key factors identified by the participants which had influenced their learning were: (1) Other Young Explorers, (2) being involved in making decisions and having choices, (3) having time to learn at their own pace; time to get comfortable with people; being able to talk with other people (to make connections); (4) group leaders, and (5) wild camping. Data from 16 interviews supported these outcomes, while the physical challenges (of climbing peaks) and cultural interaction with local people were highly valued aspects of the expedition. Participants were more aware of risks and more confident about safety issues and taking risks after the expedition. These important outcomes may be transferred to future expeditions, higher education or employment. Personal development and training organisations should consider these findings.

**Keywords:** youth; expedition; British Exploring; Sail Training Toolkit; Himalayas

**DOI:** 10.14712/23366052.2016.11

## INTRODUCTION

There is a growing body of evidence to link youth expeditions and gap years with a range of outcome benefits for participants, but to date, there have been relatively few insights into what brings about these reported outcomes. The Sail Training International Programme Self-Assessment Toolkit (2011) provides a framework for making connections between sail training practices and outcomes for participants. Based on relevant research in the areas of youth development, experiential learning and adventure education, the Toolkit sets out a model for youth development through sail training. It includes an outcomes-based feedback form which can be used to gain further insights into the factors which influence outcomes for participants. This study used a modified version of the Sail Training Voyage Toolkit (2011) to evaluate outcomes of a five-week British Exploring Society youth expedition in the Himalayas.

### **Background to Expeditions**

Evidence for personal gains from Outdoor Education, Outward Bound and Adventure Education began to be published by a number of authors through the 1970s, 1980s and 1990s (Barrett & Greenaway, 1995; Hattie, Marsh, Neill, & Richards, 1997; Hopkins & Putnam, 1993; Loynes, 1999; Miles & Priest, 1990; Wurdinger, 1997). The effects of wilderness experiences on the individual and on groups have been also been extensively reported (e.g. Friese, Hendee, & Kinziger 1998; Gass, 1993; Sakofs, 1992), and in most cases shown to have positive outcomes.

British Exploring Society (BES), formerly The British Schools Exploring Society, is a UK based charity located at the Royal Geographical Society in London and was founded in 1932 by the late Surgeon Commander G. Murray Levick, a member of Scott's last Antarctic expedition of 1910–13. It is one of the longest running organisations of its kind, which for over 80 years has organised exploratory expeditions for young people to remote regions with leaders drawn from universities, teaching, medical professions, industry and the services (see Allison, Stott, Felter, & Beames, 2011; Stott, Allison, & Von Wald, 2013). The 1970s and 1980s saw the British overseas youth expedition initiated by BES transform from a product exclusively for the socio-economically privileged into one catering for a 'much larger range of children of varying social backgrounds and academic abilities' (Grey, 1984, p. 17). Kennedy's (1992) 10-week overland expeditions to the Sahara desert with unselected inner city youth from Liverpool was an early example, where he claimed that expeditions had a major influence on the social and moral development of the members.

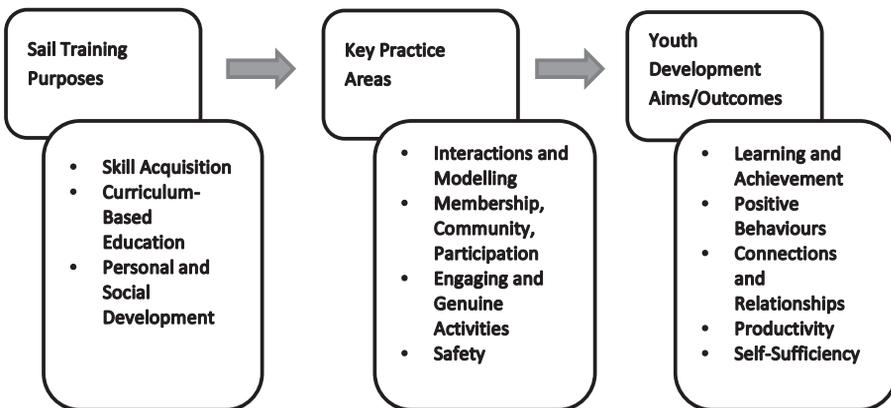
A recent literature review (Stott, Allison, Felter, & Beames, 2015) analysed 35 post-1990 key publications which met the criteria: youth expedition; duration exceeding 14 days, self-propelled, and based overseas or out-of-state and demonstrated how the outcomes of expeditions fitted into Greenaway's (1998) model of personal growth. Greenaway (1998) adapts a model originally developed by Giges and Rosenfeld (1976), which he terms the 'four arrows' model. As Greenway notes, "personal growth can be viewed as making new connections in any of several directions" (p. 25). Accordingly, the four arrows model represents the ways in which a person may develop during a given educational experience:

- **upward** to achieve one’s full potential;
- **outward** to make contact and encounter others;
- **inward** to increase our awareness of who we are, and what we want, need, sense, feel, think, and do;
- **and downward** to touch earth, to be grounded, and to connect (Greenaway, 1998, p. 25).

Greenaway, argues that this model lends structure and definition to the typically amorphous term ‘personal development’. The literature highlights that emerging research in the area of youth expeditions is primarily based on the results of case studies. While this type of research offers insights, it does not show signs of moving towards wider generalizability across differing contexts. In order to gain further insights and understanding about the benefits and impact of expeditions for participants it seems logical to move towards larger scale research which allows for the investigation of the numerous small case studies against larger data sets to provide evidence of the value of such experiences. With this in mind it is useful to consider parallel work which is ongoing in the field of Sail Training.

### Sail Training

Sail Training International (STI) was established in its present form in 2002, but its history dates back to 1956. Its purpose today is the development and education of young people through the sail training experience, regardless of nationality, culture, religion, gender or social background. STI is a registered charity (not-for-profit organisation) and has worldwide membership and activities. In 2011 it published its Sail Training Programme Evaluation Self-Assessment Toolkit (Sail Training International, 2011) which describes a youth development model derived from relevant research and sail training practices. The model has a focus on the process that connects the purposes of sail training with factors that contribute to, and constitute evidence of, positive outcomes for young people. The model presents a “common language for youth development through sail training” (p. 5). Figure 1 shows the Sail Training International Model.



**Figure 1.** The Sail Training International Model: Youth Development through Sail Training (Sail Training International, 2011, p. 7)

## **British Exploring Society**

British Exploring Society (BES) is also a personal development charity which strives to develop personal and practical skills that are of genuine long-term value to those taking part. Under the heading ‘Adventure with Purpose’, BES state “We create unique expeditions to challenge and transform the expectations and future lives of the young people we work with” (<http://www.britishexploring.org/our-approach/impact.aspx>).

### **Benefits and impact: The value of youth development activities**

Understanding the benefits and impact of youth development activities is in the interest of those who provide these activities. Better understanding could lead to increased programme effectiveness, activities better aligned with stated goals, improved programme marketing and fundraising. Like sail training operators, expedition organisers would greatly value a simple tool that provides ‘proof’ that their expedition makes a positive difference in young people’s lives (Sail Training International, 2011).

The toolkit defines outcomes as “the real benefits and changes that young people experience during or after participating in a sail training programme” (p. 36). Since these benefits and changes are difficult to measure, the toolkit suggests different indicators as a ‘proxy’ for the outcome. This study used the outcomes-based feedback instrument from the toolkit, modified for use with expedition participants, in order to provide evidence for outcomes (benefits and changes) experienced by participants on a youth expedition.

This study aimed to assess the applicability of the Sail Training Programme Evaluation Self-Assessment Toolkit (Sail Training International, 2011) mentioned earlier and presented in Figure 1, to a British Exploring Society five-week expedition in the Himalayas.

Objective 1: to evaluate the learning and benefits to students undertaking a five-week Himalayan expedition – students complete post-expedition questionnaires modified from the toolkit.

Objective 2: to explore and test the findings from the questionnaires through interviews.

Objective 3: to synthesise the current data, compare with previous literature on expedition outcomes and youth development and consider the wider use of the Toolkit in different youth development contexts.

## METHODS

### **Expedition Organisation**

The 24 Young Explorers on the British Exploring Ladakh 2013 Expedition were split into three groups (known as ‘Fires’) for the duration of the expedition, each with two leaders plus one floating assistant leader. One of the fires consisted of five university students (one leader was a university academic) while the other two fires consisted of 9 and 10 school age students (age 16–18) respectively. Fires camped, cooked, travelled, climbed peaks and undertook science projects together for the whole of the five-week expedition (see

Table 1). In addition, unattached leaders included the Chief Leader, Deputy Chief Leader and two medical doctors who oversaw planning, safety and general organisation of expedition logistics to support the fires. Ethical approval for the study was granted by the author's University's Ethics Committee in July 2013.

**Table 1.** Expedition Itinerary

Phase/days	Expedition Activities
Phase 1 (days 1–3)	Arrive and acclimatise in Leh (3500 m). Camping. Local shopping, learning local cooking skills
Phase 2 (days 4–7)	Travel from Leh to base camp. Slow acclimatisation from 3500 m to 4800m over four days, ~300m climb per day.
Phase 3 (days 8–31)	At Base camp. Science and mountaineering activities. River studies, meteorology, geology, botany, glaciology. Visiting glaciers at 5400 m and climbing peaks up to 5995m.
Phase 4 (days 32–35)	Travel back to Leh in one day, 2 nights camping, cleaning & packing equipment. Last night in guest house. Fly back to UK.

## Data Collection

Data were gathered from a variety of sources: surveys of 22 participants via post-expedition feedback forms; feedback, stories and narratives of six participants via three interviews in the first, third and fifth (final) weeks of the expedition; and photo/written journals kept by the researcher.

The Sail Training Voyage Feedback Form is based around the five youth development outcomes (right hand box in Figure 1). The form (which can be found in Sail Training International, 2011, Appendix I) has nine questions for each of the five outcomes. The questionnaire has not yet been tested for validity and reliability as insufficient numbers of completed questionnaires are currently available.

The Expedition Feedback Form used in this study was a modified version of the Sail Training Voyage Feedback Form. For example, the term 'voyage' was replaced by 'expedition', skipper was changed for leader and crew for other Young Explorers, so that all questions were relevant and grammatically consistent and meanings consistent with a five-week Himalayan trekking and mountaineering expedition (see Figure 2).

Young Explorers were invited to complete the Expedition Feedback Form on the return flight home, but due to illnesses, only 22 post-feedback forms were returned. Based on indicating their willingness at the start of the expedition, six Young Explorers were selected, two (a male and a female) from each fire, to take part in three interviews in the first, third and final week of the expedition. Interviews were conducted in a tent away from the other expedition members and questions were broadly based around the five Sail Training youth development outcomes seen in the right hand box in Figure 1. Interviews were recorded and transcribed after the expedition. Interviews were conducted on a one to one basis with the researcher and lasted 10–15 minutes each. Interviewee C (Maya) was only interviewed in week one due to illness. All 16 interviews were transcribed and comments which linked to specific items in the feedback form were identified and marked.

## ANALYSIS AND DISCUSSION

### Post-Expedition Feedback Data

Figure 2 summarises the post-expedition feedback form results.

Post-expedition Feedback form		Post mean score	Post max score	Post min score
<b>Learning &amp; Achievement</b>				
1.1	<b>I got to practice and learn a new skill (or two or three) during the expedition – something I did not know before.</b>	3.4	4	2
1.2	<b>I learned something new about trekking and mountaineering during the expedition.</b>	3.5	4	2
1.3	<b>I learned something new about living in wild areas.</b>	3.4	4	2
1.4	I did something I did not think I could do before.	2.7	4	0
1.5	I learned something about being with people and being part of a group.	3.3	4	1
1.6	I learned about being in a team and what role I can play.	3.3	4	1
1.7	I know more now about what I am capable of doing.	3.2	4	1
1.8	<b>I feel more confident now about what I can do.</b>	3.5	4	1
1.9	I believe I achieved something during the expedition.	3.7	4	2
<b>Positive Behaviours</b>				
2.1	<b>I was able to make a contribution and lead some part of the expedition.</b>	3.4	4	2
2.2	I have more confidence about my ability to be part of a team and work with other people.	3.0	4	1
2.3	I have more confidence about my ability to lead other people.	2.8	4	1
2.4	I set goals for the expedition and achieved what I wanted to achieve.	2.8	4	1
2.5	I learned how I could be part of British Exploring in the future.	3.0	4	0
2.6	<b>I successfully carried out my duties on expedition (washing up, cooking, fetching water, etc.).</b>	3.5	4	3
2.7	I was able to resolve a conflict on expedition (mine or someone else's).	3.0	4	0
2.8	<b>I know what I do has an effect on others.</b>	3.6	4	2
2.9	I feel more comfortable asking for help or information.	3.2	4	1

Post-expedition Feedback form		Post mean score	Post max score	Post min score
<b>Connections and Relationships</b>				
3.1	I learned about caring about other people.	3.0	4	0
3.2	I know now better ways to talk to other people, including people my age and adults.	3.0	4	1
3.3	I can relate my experience on the expedition to what happens at home, in school, at university or in my job.	3.3	4	2
3.4	I learned a skill on the expedition that I will be able to use at home.	3.1	4	2
3.5	I want to do another British Exploring expedition.	2.3	4	0
<b>3.6</b>	<b>I met some other people who I will try and keep in contact with.</b>	<b>3.9</b>	<b>4</b>	<b>3</b>
3.7	I want to try and be an expedition fire leader in future.	2.6	4	0
3.8	I now have a better understanding of the consequences of my actions.	2.9	4	0
<b>3.9</b>	<b>I understand myself better, what I am good at and what I still need to learn.</b>	<b>3.4</b>	<b>4</b>	<b>2</b>
<b>Productivity</b>				
4.1	I learned how to participate in a group and am better at it now.	3.2	4	1
<b>4.2</b>	<b>I volunteered for different jobs on the expedition and learned how to do them.</b>	<b>3.4</b>	<b>4</b>	<b>2</b>
<b>4.3</b>	<b>I learned how to help other people when they needed it.</b>	<b>3.4</b>	<b>4</b>	<b>1</b>
4.4	I think we completed the expedition successfully.	3.3	4	2
4.5	I have a better idea about how to use my time more productively.	3.2	4	1
4.6	I am more comfortable expressing my opinion or describing my ideas.	3.0	4	1
4.7	I can see ways I can do things differently to make a positive contribution at home, in school, at university or in my job.	3.2	4	1
<b>4.8</b>	<b>I know I want to keep learning new things.</b>	<b>3.9</b>	<b>4</b>	<b>3</b>
<b>4.9</b>	<b>I think I can be more responsible for myself.</b>	<b>3.5</b>	<b>4</b>	<b>1</b>
<b>Self Sufficiency</b>				
5.1	I learned that I can rely on others when I need to.	3.2	4	1
<b>5.2</b>	<b>I learned I can rely on myself.</b>	<b>3.6</b>	<b>4</b>	<b>1</b>

Post-expedition Feedback form		Post mean score	Post max score	Post min score
5.3	I know what things I do well and what things I don't do very well.	3.4	4	3
5.4	I am now better at communicating clearly what I need with others.	3.2	4	1
5.5	<b>I have a better understanding of the risks associated with wilderness expeditions and am comfortable with taking those risks.</b>	<b>3.5</b>	<b>4</b>	<b>2</b>
5.6	I feel more comfortable in looking for work or a volunteer opportunity.	3.2	4	1
5.7	I feel more confident in my work or volunteer position.	2.7	4	0
5.8	<b>I think I can make a positive contribution to a team.</b>	<b>3.5</b>	<b>4</b>	<b>2</b>
5.9	<b>I now know what I can do to be physically healthy.</b>	<b>3.7</b>	<b>4</b>	<b>3</b>

**Figure 2.** Post-expedition feedback results for BES Ladakh 2013 Young Explorers (n = 22). Items with mean scores of 3.5 or higher are shaded to indicate those areas where the YEs felt that they had gained

Given that the Likert scale ranged from 0 to 4, all mean values in Figure 2 exceed 2.3 (meaning better than ‘OK, a little’). Only 6 of the 45 items had mean scores below 3.0, indicating that the Young Explorers collectively responded with ‘good, or some’ to 87% of the statements which can be regarded as a positive outcome for the expedition overall.

After each of the five sections in the Feedback Form, Young Explorers were asked to indicate which of seven factors had influenced what they had learned, what had influenced their positive behaviour etc., and then to rank them in importance (Table 2). *Other Young Explorers* was ranked first in four of the five categories, and even in the fifth category it was ranked third. Clearly Young Explorers identify their peers on the expedition as having a great deal of influence on their experience of the expedition across each of the outcome dimensions. Peer learning has been recognised in the study by Williams and Williams (2001) where they observed that children learn spontaneously from each other in everyday activities within the preschool culture. However, to the best of our knowledge this is the first time that peer learning or support has been recognised in the youth expedition context.

**Table 2.** What helped YEs most to learn, be positive in the group, make connections, be productive and be self-sufficient. The top three under each category are shaded

<b>What helped me most in learning was:</b>	<b>Sum of Ranks</b>	<b>Overall Rank</b>	<b>What helped me most to be positive in the group was:</b>	<b>Sum of Ranks</b>	<b>Overall Rank</b>
Trekking & mountaineering	59	3	Trekking & mountaineering	54	3
Wild camping	71		Wild camping	60	
Fire Leaders	68		Fire Leaders	66	
Chief Leader Team	83		Chief Leader Team	68	
Other YEs	44	1	Other YEs	32	1
Being able to practice	75		Being able to try things out	65	
Having time to learn at my own pace	58	2	Having time to get comfortable with people	51	2
Other	6		Other	0	
<b>What helped me most to make these connections was:</b>	<b>Sum of Ranks</b>	<b>Overall Rank</b>	<b>What helped me most to learn about being productive was:</b>	<b>Sum of Ranks</b>	<b>Overall Rank</b>
Trekking & mountaineering	74		The trekking & mountaineering	62	
Wild camping	61	3	Wild camping	61	
Fire Leaders	64		Fire Leaders	53	2
Chief Leader Team	70		Chief Leader Team	66	
Other YEs	39	1	Other YEs	54	3
Being able to talk with other people	51	2	Seeing other people be productive	56	
Having time to talk about things by myself	67		Being involved in making decisions and having choices	48	1
Other	2		Other	0	
<b>What helped me most to become self-sufficient was:</b>	<b>Sum of Ranks</b>	<b>Overall Rank</b>			
Trekking & mountaineering	56				
Wild camping	50	2			
Fire Leaders	56				
Chief Leader Team	73				
Other YEs	42	1			
Learning about opportunities and what people do with them	53	3			
Having to rely on myself at home	59				
Other	0				

Clearly it was felt that bringing together this geographically diverse group of young people from all parts of the UK, with ages ranging from 15 to 25, and placing them in an isolated high Himalayan valley for three weeks, was the most influential factor. This connects well with Beames' (2004a) findings, where he identified five critical elements of an expedition, two of which were 'diverse group' and 'group isolation'. However, what remains unclear is what is meant by 'diverse'. This is in keeping with research by Larson, Hansen and Moneta (2006) on developmental experiences across various organised youth activities, Stott et al. (2013) in expedition contexts and Allison et al. (2007) in sail training.

The other factor ranked first in the 'being productive' category was '*being involved in making decisions and having choices*'. The Chief Leader team deliberately set out to make this expedition belong to the Young Explorers. As far as possible, within certain safety boundaries, responsibility for making decisions about where to go and what to do was devolved to the Young Explorers. In some cases this caused tension, especially with some fire Leaders, who had become used to the daily schedule being determined by the Chief Leader, from when they arrived in the country and during the travel/acclimatisation phase from Leh (3200 m) to the base camp (4850 m) which took around 12 days. Having the young people make decisions can take much longer, involves negotiation rather than telling, can lead to making 'wrong' decisions (in the eyes of more experienced leaders) and sometimes false starts. In his second interview, John stated that he had "*learnt to be more organised because he had had to go back to recover an object left behind*" (John 2, 6:25–6:30). This is an excellent example of experiential learning (Miettinen, 2000). In the case mentioned by John, 'going back' was a 5 km journey each way, sufficient to stick in his memory for some time and for it to be recalled in the second interview. Allison and Von Wald (2010) noted that "*in order for such experiences to be of educational value we argue that creating space for students to make mistakes and to explore (in literal and metaphorical terms) is of crucial importance*" (p. 1).

Ranked in second place in Table 2 were: having time to learn at my own pace (for learning); having time to get comfortable with people (positive in the group); being able to talk with other people (to make connections); fire leaders (for being productive, although 'seeing other people be productive' was ranked a very close fourth place); and, wild camping was ranked second in the 'what helped me most to become self-sufficient' category. For the improvement of personal effectiveness, an expedition based wilderness programme seemed to be of relatively more value (mainly on account of the impact of the wilderness environment) than a centre based adventure programme (Greffrath et al., 2011). On the basis of comments in the interviews, it may be interpreted that having time to learn at their own pace, to talk with other people, to see other people being productive (sometimes with the support and encouragement of their fire leaders) and to wild camp are the result of modern life denying young people uncluttered time and space to think, reflect, talk and observe, and the expedition created these spaces which the young people found both unusual and valuable (Allison, 1998). In his third interview Harry said he "*had time to reflect on things in the (beautiful) environment, for example by the river in the morning*" and "*considers his mind is always doing things back at home, but finding the solitude very pleasant*" (Harry 3).

Again, Allison (1998) emphasised the importance of this solitude and time for reflection.

Since this expedition took place in a high altitude Himalayan valley surrounded by peaks in the 5500–6000 m range, it is not surprising that trekking, mountaineering and wild camping were cited as influential in helping learning, making connections and being positive in the group (Table 2). Investigating the experiences of adolescents on an expedition to New Zealand’s sub-Antarctic, Orams (2015) found that five interrelated themes emerged from the data: experiential learning; uniqueness of the setting; uniqueness of the experience; sharing with others; adventure; and sense of accomplishment. These findings are consistent with both previous research on the experiences of adolescent participants in other wilderness-based outdoor education programmes, and those of our study. All tasks, including trekking, climbing peaks, pitching and striking camps and cooking were carried out in the same fires. In her second interview Debbie ...

*“enjoyed getting to the summit as a team. The challenge made the attainment more rewarding”*,

and Jim (in his final interview) cited ...

*“reaching the glacier”* and *“climbing Tanglan La”* (a 5700 m peak)

as the highlights of his expedition, thus confirming the influence of trekking and mountaineering as important elements of the expedition. In her final interview Jo chose as one of her expedition highlights ...

*“the peaks – and the sense of accomplishment after being in the first and fastest group to climb one of the peaks”* and was *“happy that all the members in her group got to the top”*.

Climbing a peak is rewarding, but climbing one with a group you have been living with for the past three or four weeks seems to be even more rewarding. It adds something different and special to the achievement. Interestingly, Greffrath et al. (2013) found that a centre-based adventure program improved communication abilities, productiveness and competition within the group more than an expedition based wilderness programme, except that ‘group morale’ was in favour of the expedition-based wilderness program, which showed a medium effect ( $d = 0.5$ ).

To summarise, analysis of this part of the Feedback Form along with contributions from some of the interviews has highlighted some key factors which the Young Explorers believed influenced their learning, ability to be positive in the group, to make connections, to be productive and self-sufficient.

## **Six Case Studies: Feedback data and interviews**

Comparison of the feedback form data of the sample of six Young Explorers more or less reflects the expedition mean scores with only minor exceptions. In Learning and Achievement, the six Young Explorers felt that they had first ‘achieved something during the expedition’ (five of the six gave the top score of 4 to item 1.9), second that they ‘felt more confident about what they could do’ and that they had ‘learnt something about trekking and mountaineering’, and thirdly they had ‘learned about being in a team and knew more now about what they were capable of doing’. They cited the ‘Other Young Explorers, trekking and mountaineering’ and the ‘Fire leaders’ as having helped them most.

In terms of positive behaviours, the six Young Explorers felt that first ‘they knew what they did had an effect on others’, second that they felt they had ‘successfully carried

out their duties' (washing up, cooking, fetching water, etc.), and thirdly they felt able to 'resolve a conflict' on the expedition. They cited the 'Other Young Explorers, trekking and mountaineering' and 'having to get comfortable with people' had helped them most. In terms of connections and relationships, the six Young Explorers felt that first they had 'met some other people who they will try to keep in touch with', second that they felt they 'understood themselves better', and thirdly they 'felt able to relate their experience on the expedition to what happens at home, in school/university etc.' They cited the 'Other Young Explorers, Fire leaders and being able to talk with other people, wild camping and having time to talk about things' had helped them most. On the final point about being able to relate their experience on the expedition to what happens at home, in school/university, Johnston et al. (2014) examined how participants reported being affected by a trip to the Antarctic Peninsula, particularly in terms of later decisions regarding learning, professional lives, and environmental behaviour. Influences noted by respondents in their study included effects on choices made in relation to academic pursuits and career paths, as well as development of their environmental values through increased awareness of tourism impacts, Antarctic region sustainability issues, and global issues such as climate change. Hickman and Collins (2014) also studied the operation and impact of expedition participants' trans-expedition reflective practice on structuring and optimising the transfer process so that outcomes of expeditions offer positive benefits to participants' general lives.

In terms of their productivity, the six Young Explorers felt that first they 'knew they wanted to keep learning new things' and they could now be 'more responsible for themselves', second that they felt 'they could see ways of doing things differently to make a positive contribution at home, in school/university' (cf. see Hickman and Collins, 2014), and thirdly they had 'learned how to help other people when they needed it and to participate in a group better'. They cited that the 'Other Young Explorers, being involved in making decisions' and 'having choices' had helped them most. Finally, in terms of their self-sufficiency, the six Young Explorers felt that first they had 'learned to rely on themselves', second that they felt 'they could make a positive contribution to a team' (cf. Greffrath et al., 2011) and 'knew what they could do to be physically healthy', and thirdly they had 'better understanding of the risks associated with a wilderness expedition and felt more comfortable taking those risks', and they 'knew what things they do well and not so well'. They cited that the 'Other Young Explorers, wild camping and trekking and mountaineering' had helped them most.

### **Linking Feedback data to interviews**

Table 3 shows where there were links between the Young Explorers Feedback Form Top Rated (Table 3A) and Second Rated (Table 3B) items and the interview data. Parentheses indicate pseudonym, interview number and time (minutes and seconds) in the interview when the statement was made.

**Table 3.** Links between YE Feedback Form Top Rated (3A) and Second Rated (3B) items and interview data. 3C shows other items mentioned by interviewees as impacting their experience

		Interviewees					
3A: Top	Item No.	A	B	C	D	E	F
	1.9		*		*	**	***
	2.1		*		***	*	**
	2.8						
	3.6	**		*	**	**	*
	4.8						
	4.9						
	5.2						
3B: Second	Item No.	A	B	C	D	E	F
	1.6	***			**		
	1.7						
	2.6	*			**		
	3.9				*	**	
	4.7				*		
	5.8				**	*	
	5.9	*			*		
3C: Other		1.3	1.1		1.1	2.7	1.1
Items		1.5	1.2		1.2	4.5	1.8
		1.6	1.3		1.5		2.4
		2.7	2.1		2.5		3.4
			3.1		3.6		4.5
			4.1		4.1		
			5.4		4.2		
					4.3		
					5.1		

Note: \* = interview makes reference to item once; \*\* = interview makes reference to item twice; \*\*\* = interview makes reference to item three times

In their review, Stott et al. (2015) used Greenaway’s Four Arrows model (Greenaway, 1998) to help understand, from the literature, how personal growth can be viewed as making new connections in four directions: (1) upward (achieve one’s full potential);

(2) outward (to make connections and encounter others); (3) inward (to increase awareness of who we are), and (4) downward (to touch earth, to be grounded).

With particular focus on the factors that Young Explorers believed influenced their experience of the expedition, interview data provided additional insights about the feedback data for each of the outcomes. Excerpts from the interviews emphasise some aspects of the feedback forms and offer specific detail and examples about what was happening from the Young Explorers' perspectives.

In Learning and Achievement (see items in Figure 2), John commented upon how the teamwork was developing ...

*"I think ... like ... when we started a few people weren't, like, doing as much as they could and a few people were doing a bit more ... but as it's gone on and everyone's kinda found, like what their role is and their strengths within the fire, so you find people helping each other out for bits that their not so good at ... I think it's developed a lot ..."* (John 1).

Debbie said that ...

*"getting the stoves working is definitely a difficult skill, they are quite temperamental but I think together as a fire we've learnt how to get them working ..."* (Debbie 1).

Debbie had also learnt about some of the plants and animals that lived around her at base camp, as well as the people too ...

*"I've definitely learnt a lot about the people in my fire ... um, some of them I didn't know, hadn't even met them before we came on the expedition ... and I now know a lot about them, through living with them 24/7 ..."* (Debbie 1).

With reference to camp duties, by the middle of the expedition Jo commented ...

*"I think its settling down into more ... I'm good at this job so I'm going to do it more, rather than, kind of, everyone has a go at everything ... a few people are good at cooking, and they like cooking ... I've been sorting out stoves quite a lot ..."* (Jo 2),

and Debbie stated that ...

*"it was all about recognising that not everyone has the same feelings as you ... once everyone realised it was going to be different for every person, it became a bit easier ... because I think I was trying to organise food for everyone, and that's probably a bit silly ... because actually if you get more voices in, then you hear, then it all works a bit better ..."* (Debbie 2).

These quotes illustrate the second of categories proposed by Stott et al. (2015), outward growth (to make connections, encounter and learn about others). This includes connect- edness to others (Allison, 1998, 2000, 2005), a sense of community (Andrews, 1999), interpersonal skills (Beames, 2003), interpersonal growth (Beames, 2004b), social adjust- ment (Bobilya et al., 2009), avoiding loneliness (Stott & Hall, 2003), motivating others, leading through consultation with others (Stott & Hall, 2003), increased sociability and responsibility (Watts et al., 1992, 1993a, 1994), living with a diverse group of people; learning centred around diverse community (Takano, 2010) and extending the lessons of the group (Allison et al., 2011).

In terms of positive behaviours (section 2 of the feedback form), items 2.1 'I was able to make a contribution and lead some part of the expedition', and 2.3 'I have more confidence about my ability to lead other people', Jo said ...

*"I think I've become more confident, because I was put in charge ... for a period of about four days I think ... I planned the two ... kind of ... day trips we did ... doing science*

*and I think it went relatively well ... so that's given me a bit more confidence ..."* (Jo 2) and *"our group split up ... so we (me and one other) were navigating for the entire third day which was really tiring, but nobody really questioned our decisions ..."* (Jo 2).

Jo's comments find support in the literature as they show evidence of personal reflection (Allison, 1998, 2000, 2005; Allison & Von Wald, 2010; Andrews, 1999; Rea, 2006), connectedness to self (Allison, 1998, 2000, 2005), greater understanding of herself (Beames, 2005) and the navigation which Jo refers to shows evidence of learning from difficult experiences (Takano, 2010). Beames and Stott (2008) identified outcomes of a 10-week expedition to Costa Rica as becoming more self-resilient and self-aware, more confident leading and working with others.

Section 3 of the feedback form was about connections and relationships (Figure 2). With reference to item 3.9 "I understand myself better, what I am good at and what I still need to learn", Debbie said ...

*"when to give people space and when to try and help them yourself ... it's easy here to ... when someone's not feeling very well ... to always get involved, and you know, ask them things ... when actually, sometimes people just need a bit of space here ..."* (Debbie 1).

This statement suggests that Debbie has increased her ability to control emotions (Stott & Hall, 2003; Watts et al., 1992) and reflect on herself and actions (Allison, 1998, 2000, 2005; Rea, 2006). In her final interview Debbie said ...

*"what's made this trip so special is the people ... like when you spend so much time with a group of people you get very close very quickly, so spending time just learning about people, hearing them talk about their lives back home ... and it brings you even closer I think ..."* (Debbie 3), and *"getting out of our comfort zones together definitely binds people ... when you have experiences, um together ... like I'm never gonna have experiences with any other group of people ... like, quite the same so the bonds are never going to be quite the same"* (Debbie 3).

This statement suggests that Debbie has increased her connectedness to others (Allison, 1998, 2000, 2005), her sense of community (Andrews, 1999), and her interpersonal skills (Beames, 2003). In terms of productivity, with reference to item 4.2 'I volunteered for different jobs on the expedition and learned how to do them', in the final interview Jim said ...

*"since the last interview ... I've been persuaded (talking with the fire leader) ... to step up to the plate a bit more ... so yesterday, I volunteered to represent my fire at a whole expedition discussion"* (Jim 3),

and linking to items 4.7 and 4.8 (Table 3) Jim went on to say ...

*"rather than sitting on Facebook on my phone for ten minutes before going to bed, I'll read a book ... the first few days of the expedition, when we were doing nothing, I'd be reaching for my phone ... but now that compulsion's gone ... if I can stop that compulsion to play an app or whatever ... I can actually get up half an hour earlier and read some more books ..."* (Jim 3).

Here Jim has shown increased sociability and responsibility (Watts et al., 1992, 1993a, 1993b, 1994) volunteering to represent his fire at a whole expedition discussion. In terms of self-sufficiency, with reference to item 5.9 (Figure 2), John commented ...

*"it gets so cold at night, and warm during the day, you have to be careful to ... like ... put on enough sun cream, or you can burn quite a bit ... then you have to keep your personal hygiene levels up, because it could be quite easy to kind of just not ... not do too*

*much about them but you got to keep on top of yourself ... so you stay healthy really ... don't wanna fall ill ..."* (John 1).

This is supported by Stott & Hall (2003) who reported a statistically significant change in expedition participants' self-reported assessment of their personal hygiene before and after a wilderness BE expedition in NE Greenland.

Other themes not explicitly covered by the feedback form but which emerged strongly from the interviews were (1) physical challenge is important, (2) exposure to the local culture was valued, (3) the expedition seemed to have given participants an appetite to undertake more travel and trekking/mountaineering.

With reference to physical challenge, John said ...

*"it has been more of a physical challenge (the past week) because we've been 500 m higher ... I think it's good to challenge yourself, to see what you can do ... you want to be able to kind of summit things, make sure you can carry the met box all the way up ... I think that's been quite a highlight for me ..."* (John 2).

Asfeldt & Hvenegaard (2014) summarised the common critical elements of educational expeditions into five broad categories related to: activities; new environments; intentional processing and reflection; group experiences; and physical and mental challenges. In this statement, John confirms that the physical challenge was a highlight for him. Since the Sail Training Toolkit was designed for use in sailing, it is not too surprising that the physical challenge was less of an emphasis in sailing, whereas the physical challenge referred to by Young Explorers in these interviews was about climbing peaks, carrying loads, dealing with altitude, which would not have featured on board a ship.

With regard to culture, Debbie said ...

*"It was just ... um ... was really good to get a bit of culture, um to see the culture and the people and um, interact with them a bit because obviously we've been very isolated for a long time, so that was definitely really good ..."* (Debbie 3).

John stated that ...

*"we're visiting a few of the villages ... which I think is, like, another really important part ... to see the culture 'cos you don't really get it too much when you're up here ... like we saw one goat herder and that's about it for, like, the culture side ..."* (John 2).

In one study, 94% of expedition participants reported that their understanding of other cultures had increased as a result of their experiences (Sheldon et al., 2009, pp. 42–47) and this is backed up in this study by the experiences of Debbie and John in these statements. Finally, with reference to gaining an appetite to undertake more of this, Jim said ...

*"I do wanna go backpacking in south east Asia, that's something I really wanna do now ... is take a year out between a degree and a masters or PhD ... and ... work for six months, earn the money ... spend six months maybe India, Bangladesh, Philippines, Tokyo ... Shanghai ..."* (Jim 3).

Traditionally studies in experiential learning have tended to concentrate on participant outcomes, and Ewert (1983) likened the elements and processes involved in outdoor education to a "black box", where "we know something works, but we don't know how or why" (p. 27). Beames' (2004a) study aimed at finding out what was inside the black box, and his work highlighted, as critical elements in a 10-week expedition to Ghana with Raleigh International, the importance of (1) diverse groups (2) living in isolated environments, (3) Changing groups and moving to a new physical setting, (4) self-sufficient

living conditions and (5) physically demanding activities. In this study, all but the third of these critical elements have been confirmed with new evidence. In the BES Ladakh 2013 expedition, since it was much shorter in duration, there was no attempt made to change the groups in mid-expedition. If this had been done, it would have been interesting to have evaluated the effect it had on Young Explorers post-expedition evaluations. Having said this, groups were moving to new physical settings either daily (during the acclimatisation journey and in mid-expedition) or at least every few days. This facilitated the attainment of some of the outcomes such as self-sufficiency, climbing peaks (seen as highlights and physical challenges) and working as part of a team.

## CONCLUSIONS

The Sail Training International Programme Self-Assessment Toolkit was used to evaluate outcomes of a five-week youth expedition in the Himalayas. Data generated completed at the end of the expedition were complimented by data from 16 interviews conducted during weeks one, three and five of the expedition.

Self-reported data from 22 modified Sail Training Voyage Feedback Forms completed at the end of the expedition showed that participants were positive in a range of skills, behaviours, relationships and self-sufficiency. Key factors identified by the participants which had influenced what they had learned, what had influenced their positive behaviour etc., were (1) Other Young Explorers, (2) being involved in making decisions and having choices, (3) having time to learn at their own pace (for learning); time to get comfortable with people (positive in the group); being able to talk with other people (to make connections); (4) fire leaders, and (5) wild camping. Data from the 16 interviews provided further evidence for these outcomes, but in addition having a physical challenge (i.e. climbing peaks) and some cultural interaction with local villages and in Leh, were highly valued aspects of the expedition.

## ACKNOWLEDGEMENTS

The authors thank British Exploring Society for hosting this expedition and Andy Rockall, the Chief Leader for giving TAS permission to undertake the fieldwork during the Ladakh 2013 expedition. Liverpool John Moores University supported TAS in this work. Tom Potter made many useful comments in his review of an earlier draft of the manuscript.

This paper was supported by the GAČR project Models of bodily experience in the theoretical foundations of experiential education and its kinanthropological context (GAČR 16-19311S).

## REFERENCES

- Allison, P. (1998). Greenland: More Questions than Answers. *Horizons*, 2, 16–20.  
Allison, P. (2000). *Research from the ground up: Post expedition adjustment*. Cumbria: Brathay Hall Trust.

- Allison, P., Stott, T., Felter, J., & Beames, S. (2011). Overseas youth expeditions. In: M. Berry & C. Hodgson (Eds.), *Adventure education: An introduction* (pp. 187–205). London: Routledge.
- Allison, P. (2005). Post-Expedition Adjustment – What Empirical Data Suggest? *Wilderness Education Association Proceedings 2005*.
- Allison, P., McCulloch, K., McLaughlin, P., Edwards, V., & Tett, L. (2007). *The characteristics and value of the sail training experience*. Edinburgh: Sail Training International / The University of Edinburgh.
- Allison, P., & Von Wald, K. (2010). Exploring values and personal and social development: Learning through expeditions. *Pastoral Care in Education, 28*(3), 219–233.
- Allison, P., Stott, T. A., Felter, J., & Beames, S. (2011). Overseas Youth Expeditions. In: M. Berry & C. Hodgson (Eds.), *Adventure Education* (Chapter 10, pp. 187–205). London: Routledge.
- Andrews, K. (1999). The Wilderness Expedition as a Rite of Passage: Meaning and Process in Experiential Education. *Journal of Experiential Education, 22*(1), 35–43.
- Asfeldt, M., & Hvenegaard, G. (2014). Perceived learning, critical elements and lasting impacts on university-based wilderness educational expeditions. *Journal of Adventure Education & Outdoor Learning, 14*(2), 132–152.
- Barret, J., & Greenaway, R. (1995). *Why adventure?* Coventry, UK: Foundation for Outdoor Adventure.
- Beames, S. (2003). Overseas youth expeditions. In: B. Humberstone, H. Brown, & K. Richards (Eds.), *Whose Journeys?* (pp. 289–296). Penrith: Institute for Outdoor Learning.
- Beames, S. (2004a). Critical elements of an expedition experience. *Journal of Adventure Education & Outdoor Learning, 4*(2), 145–157.
- Beames, S. (2004b). Overseas youth expeditions: A rite of passage? *Australian Journal of Outdoor Education, 8*(1), 29–36.
- Beames, S., & Stott, T. A. (2008). *Raleigh International Pilot Study Report*. Report commissioned by Raleigh International, University of Edinburgh / Liverpool John Moores University.
- Bobilya, A. J., Akey, L., & Mitchell, D. Jr. (2009). Outcomes of a Spiritually Focussed Wilderness Orientation Programme. *Journal of Experiential Education, 31*(3), 440–443.
- British Exploring Society (2014). [www.britishexploring.org](http://www.britishexploring.org), accessed 7-10-14.
- Friese, G., Hendee, J. C., & Kinziger, M. (1998). The wilderness experience program industry in the United States: Characteristics and dynamics. *Journal of Experiential Education, 21*(1), 40–45.
- Gass, M. (1993). *Adventure Therapy: therapeutic applications of adventure programming*. Dubuque, IO: Kendall/Hunt.
- Greenaway, R. (1998). In search of respectable adventure. *Horizons, 14*(4), 24–26.
- Greffrath, G., Meyer, C., Strydom, H., & Ellis, S. (2011). Centre-based and expedition-based (wilderness) adventure experiential learning regarding personal effectiveness: an explorative enquiry. *Leisure Studies, 30*(3), 345–364.
- Greffrath, G., Meyer, C. D. P., Strydom, H., & Ellis, S. (2013). A comparison between centre-based and expedition-based (wilderness) adventure experiential learning regarding group effectiveness: a mixed methodology. *South African Journal for Research in Sport, Physical Education and Recreation, 35*(1), 11–24.
- Grey, T. (1984). *The expedition experience*. Adventure Education, March/April, 17–18.
- Hattie, J., Marsh, H. W., Neill, J. T., & Richards, G. E. (1997). Adventure education and outward Bound: Out-of-class experiences that make a lasting difference. *Review of Educational Research, 67*(1), 43–87.
- Hickman, M., & Collins, D. (2014). The operation and impact of participants' trans-expedition reflective practice: structuring and optimising the transfer process. *Pastoral Care in Education, 32*(2), 157–163.
- Hopkins, D., & Putnam, R. (1993). *Personal growth through adventure*. London: David Fulton.
- Johnston, M. E., Dawson, J. P., Childs, J., & Maher, P. T. (2014). Exploring post-course outcomes of an undergraduate tourism field trip to the Antarctic Peninsula. *Polar Record, 50*(2), 147–155.
- Kennedy, A. (1992). *The expedition experience as a vehicle for change in the inner city*. Penrith: Adventure Education.
- Larson, R. W., Hansen, D. M., & Moneta, G. (2006). Differing profiles of developmental experiences across types of organized youth activities. *Developmental Psychology, 42*(5), 849–863.
- Loynes, C. (1999). Development training in the United Kingdom. In: J. C. Miles & S. Priest (Eds.), *Adventure programming* (pp. 45–51). State College, PA: Venture.
- Miettinen, R. (2000). The concept of experiential learning and John Dewey's theory of reflective thought and action. *International Journal of Lifelong Education, 19*(1), 54–72.

- Miles, J., & Priest, S. (1999). *Adventure programming*. State College, PA: Venture Publishing.
- Orams, M. (2015). Experiences of adolescents on an expedition to New Zealand's sub-Antarctic: results from the use of photo-elicitation. *The Polar Journal*, 5(2), 1–20.
- Sheldon, R., Jones, N., Durante, L., & Platt, R. (2009). Rallying together: A research study of Raleigh's work with disadvantaged young people. London: Institute for Public Policy Research.
- Rea, T. (2006). "It's Not As If We've Been Teaching Them." Reflective Thinking in the Outdoor Classroom. *Journal of Adventure Education and Outdoor Learning*, 6(2), 121–134.
- Sail Training International (2011). *Sail Training Programme: Self-Assessment Toolkit* (Eds. Von Wad, K. and Allison, P.). 2nd edition.
- Sakofs, M. (1992). Assessing the impact of the Wilderness alternative for youth programme: An Outward Bound programme for adjudicated youth. *Journal of Adventure Education and Outdoor Learning*, 9(4), 16–21.
- Stott, T. & Hall, N. (2003). Changes in aspects of students' self-reported personal, social and technical skills during a six-week wilderness expedition in Arctic Greenland. *Journal of Adventure Education & Outdoor Learning*, 3(2), 159–169.
- Stott, T. A., Allison, P., & Von Wald, K. (2013). Learning outcomes of young people on a Greenland expedition: Assessing the educational value of adventure tourism. In: S. Taylor, P. Varley, & T. Johnston (Eds.), *Adventure tourism: Meanings, experience and learning* (pp. 148–160). London: Routledge.
- Stott, T. A., Allison, P., Felter, J., & Beames, S. (2015). Personal Growth on Youth Expeditions: A Literature Review and Thematic Analysis. *Leisure Studies*, 34(2), 197–229.
- Takano, T. (2010). A 20-year retrospective study of the impact of expeditions on Japanese participants. *Journal of Adventure Education and Outdoor Learning*, 10(2), 77–94.
- Watts, F. N., Webster, S. M., Morley, C. J., & Cohen, J. (1992). Expedition stress and personality change. *British Journal of Psychology*, 83(3), 337–341.
- Watts, F. N., Apps, J., & East, M. P. (1993a). Personality Change Produced by Expedition Stress: A Controlled Study. *Personality and Individual Differences*, 15(5), 603–605.
- Watts, F. N., Webster, S. N., Morley, C. J., & Cohen, J. (1993b). Cognitive Strategies in Coping with Expedition Stress. *European Journal of Personality*, 7(4), 255–266.
- Watts, F. N., Cohen, J., & Toplis, R. (1994). Personality and Coping Strategies On A Stressful Expedition. *Personality and Individual Differences*, 17(5), 647–656.
- Williams, P., & Williams, P. (2001). Preschool routines, peer learning and participation. *Scandinavian Journal of Educational Research*, 45(4), 317–339.
- Wurdinger, S. (1997). *Philosophical issues in adventure education*. Dubuque, IA: Kendall Hunt.

Tim Stott  
t.a.stott@ljmu.ac.uk