



**Raising Standards Through Inquiry:  
Professional Development in the Natural Environment**

Royal Botanic Gardens, Kew

9-10 July 2013

**THEMES**

**1 Inquiry-Based Science Education outdoors**

Inquiry-based science education (IBSE) has its roots in hands-on science experiments carried out **in** the classroom. However the outdoors also provide a range of opportunities to deliver high quality IBSE. This theme focuses on examining tried and tested practical ideas in botanic gardens and other natural environment locations. What IBSE strategies work well and why? What topics can be taught using IBSE approaches?

**2 Reflective Practice**

The professional development of teachers and educators is increasingly seen as being key in developing IBSE in the natural environment. Reflection, both during and after practice, has been shown to lead to improvements in teacher efficacy and student learning. This theme focuses on strategies that can be used to develop reflective practice and the outcomes of such reflection. What counts as effective reflection? How can reflection be stimulated and improved?

**3 Professional Learning Communities**

Research evidence suggests that teachers and educators working collaboratively can lead to improvements in practice. This theme focuses on how professional learning communities develop and grow in the context of education in natural environments. Of particular interest are communities that involve both teachers and other educators. What makes an effective professional learning community? How do such communities develop over time?

## **4 Evaluation of IBSE**

This theme focuses on the development of innovative strategies for evaluating educational initiatives in the natural environment. It also examines tried and tested strategies and at how the outcomes of evaluation have informed practice. How can evaluation help in the design and implementation of exhibitions and programmes? What is worth evaluating? Where is the value in evaluation?

## **5 Students' Perspectives on IBSE**

The students' voice offers us an opportunity to learn from those who are the focus of IBSE. This theme examines students' perspectives on IBSE. What do they learn from IBSE? What other impacts does it have on them beyond developing their knowledge and understanding of the natural environment?

## **6 Developing training courses in LOtC**

This theme looks at different models used for training teachers and educators in 'Learning Outside the Classroom', it will also showcase best IBSE practice inside the classroom. As well as looking at course design the theme focuses on the implementation and evaluation of training. How are course participants' needs established? How does course design take account of those needs? How do we know what works and what doesn't in terms of training? What's the difference between training and education in practice?