

**“Schools have a key role to play in developing creative capabilities”
-Sir Ken Robinson-**

By: Neil Batten, Takaka Primary School, Term 3 Sabbatical Research 2010.

Purpose

The purpose of my research is to answer the question how can creative capabilities be developed in primary schools. To help answer this question I have placed an emphasis on the main point of

- What C/R management strategies are helping creativity

To support this I have also looked at

- The competencies and how they are important for active teaching and learning
- How creativity helps close the achievement gap
- What are some of the important resources for creative teaching
(The last 2 being interwoven into the fabric of the research.)

By Neil Batten

Purpose and its Relationship to Takaka Primary School

Since 2002 Takaka Primary School (TPS) have worked on Rich Topics Integrated Studies, based originally on the Queensland model. The teachers at Takaka Primary School have undergone Professional Learning Development in this area and the programme has been reviewed and revised with changes made. With the introduction of the National Curriculum, it was time to relook at Takaka Primary School's Curriculum and especially the aspect of creativity, so we ensure our finalised school curriculum ensures that all children's identities, abilities and talents are recognised. It is important that we are developing creative capabilities in the classroom.

Personally I have long had an interest in creative capabilities of primary age children. Having taught in Taranaki in the 1970's, I well remember some of the highly motivated leaders in creative classrooms. This group of teachers became well known as being the movers of environmental or quality education. I learnt to have stimulating room displays of children's work, their creative art and language efforts. It was important for me not to rush, but to slow down and do fewer things well.

As Takaka Primary School works towards finalising our new school curriculum, my personal feelings on creativity and this research has moved my understanding of creativity and helped me in this curriculum development.

Background Findings and Feelings on Creativity

Creativity has become bit of a 'buzz word' that everyone gives lip service to – and this is important because creativity is vital in our classrooms

Creativity focuses on the process of forming original ideas through exploration and discovery. In children creativity develops from their own experiences with what they are doing, rather than concern for the finished product. It is about:-

- Thinking
- Exploring
- Discovery
- Imagining (the most important of all)

It is often unexpected and exciting and involves seeing things in new ways.

Creativity emerges – David Peat argues that there can be no programme, no system of training or education for creativity; but there are many facets of classroom culture which help build the creative person. Creativity is found everywhere across the curriculum and many children as we know are not motivated in education ; and creative classroom cultures can help these children. Many children struggle to enjoy literacy and numeracy programmes but by integrating them with the Arts, with the Sciences, Technology and with PE and Health it often works for these children.

In New Zealand in the 1960's and early 1970's, I remember having freedom to teach to the interests of children. I'm not sure if a curriculum existed. I never read one. Many infant teachers taught in a very personal and imaginative way which gave way to creative expression and integrated learning was a factor.

In the late 1970's and 1980's we saw the introduction of a more standardised curriculum which has led to the achievement objective's, strands, levels and measureable objectives we saw in the late 1990's and early 2000's. Teacher's have become narrower in outlook – accountability is a key word – compliance rather than creativity and now National Standards has been introduced, with a rising emphasis on standardised testing, especially in literacy and numeracy – we need to move now – perhaps not forwards but backwards to the innovative and creative primary school of the last 1960's and early 1970's – let's focus on creativity – not National Standards. National Standards will not raise achievement, creativity will. The important aspects for me are

- Quality of Teachers and teaching
- Parent support and children background – socio economic
- Having Fantastic Stimulating resources'

How can Creative Capabilities be developed in Primary Schools

Even before we get into the classroom it is clear that leadership has a vital role to play in developing creative capabilities. Dean Fink states “that principals must shake off their shackles of uniformity and compliance and imagine and create.”

- Leaders need to be – inspirational
- They need to – Challenge assumptions and find out future trends

Only then – can they help towards creating the conditions that enable teachers ‘to give it a go’ – to try new ideas

Trust/Integrity and respect are vital – Principals need to

- Trust their feelings, their decisions
- Trust their teachers

Principals have the most influence over our schools. Hargreaves has stated “that compliance has made Principals timid. Teachers are suffering from eroded autonomy, lost creativity- this is what we need to turn around, but as Principals we must get through the compliance, cut through the red tape. Principals like this give permission for teachers to be creative. The best way to support creativity is to have a shared leadership system. We need a shared culture to exist in our school. Principals need to be risk takers, team work orientated. The best Principals are hero makers, not heroes”

The School Leader is vital

- They need to believe in and live the school vision
- They need to create achievable goals in their school
- As said above they need to ‘unravel bureaucracy and put up sign posts when people are unsure
- They need to foster team work and collaboration
- They need to challenge the status quo
- And above all else they need to celebrate success with their teachers

The Perfect Classroom for creativity

After my research, my interviews with teachers, my readings, and from talking with the parents of Takaka Primary School, I have come up with a plan to help our classrooms become more creative. The plan is made up of many facets; all of which work together to give us the culture we require for a creative classroom.

Background facets for the classroom that Schools need to provide

1. We need a School Curriculum that values questions above answers. Our new National Curriculum has given us this opportunity – it's now up to the schools to write their own curriculum which promote creativity in the classroom. A key to the new curriculum needs education to become more personalised. The word 'Achieve' however is not a good word for creativity. Achieve means that we have decided what is to be done – but knowledge is something that children access for themselves in a creative classroom – not something given to them.
2. Provide Resources that children need for creative expression. It is important that resources come from a wide range, and use a wide range of media. The use of people in the local community is motivational. ICT needs to be integrated across the curriculum. Children need a lot of time to explore unstructured, child-directed imaginative play – we need to provide resources for this.
3. Provide Space Schools need to give teachers the space to work – the space to make creative messes 'Creative messes are fine'
As above children need a space for unstructured, child-directed, imaginative play

The Nitty-Gritty – what needs to happen in our classrooms for them to become creative universes

Developing creative capabilities may seem easy; but is it?

During this section I will be referring to Claxton who outlines ‘8 sections of the learning orchestra’ that contribute to creativity



Margaret Carr and Gary Claxton have stated that teachers and schools need to work hard to create “potentiating environments” that are attractive to learners and that stretch the learners capacities – Environments where students feel they have the right to be curious, ask questions and free to take the risks involved in any learning.

I have interwoven these into ‘The Nitty-Gritty’

1. Inquiry Learning

There’s nothing new in Inquiry Learning. Elwyn Richardson ‘In the Early World’ mentions a creative teacher who in the 1950’s developed an inquiry based learning community which valued children’s own questions, research and artistic expression. Inquiry learning is a key aspect – the overall goals to be studied and how to go about this should be determined by the children – not the teachers. Our schools need to be inquiry centres – building on the many gifts and talents of children.

Children need to be challenged to explore areas that interest them. This will help them to become powerful readers – as there’s a point to their reading.

2. Topics for Inquiry Learning need to be interesting, flexible and have a purpose. They must be authentic in content – relate to things that are happening locally or globally if we are to keep the children interested.

If topics are related to children’s existing knowledge and experiences – children will be more motivated. But we need to move further than this – teachers have to give these experiences.

Real experiences are VITAL – Literacy and numeracy need to be involved with these experiences – “we need to reframe literacy/numeracy in the services of inquiry” – Hammond. Children need time to explore issues of personal interest.

3. Classroom Culture needs to emphasise the school vision/motto, the school curriculum and the school values. A positive classroom culture relates a great deal to sound behavioural management practice (See note 6)
4. Start each class time with high motivation – whether it’s visual or oral – a reading; a famous quotation; a startling statistic; a great passage from literature; a dramatic demonstration (Children love them, get involved and learn from them)
The starter could relate to subject matter at hand – but not necessarily
End each Class Time with some regular expression or quote. It needs to be simple but catchy eg. ‘go get em’ – ‘get out there and do it’
5. Give children time and space – to think and imagine. Slow down the pace of the children’s work. Let them do fewer things well – quality not quantity. Children need Term Topics.
Children also need freedom to explore their ideas. They need a classroom environment to explore and play without undue restraints. We all need time to understand a problem and toss it about. Don’t overuse individual goals. What about just doing something for pleasure.
6. Have sound behavioural management which the children have brought into.
 - Be in command
 - Never lose temper
 - Talk to children as if they’re human beings ie: show them respect
 - Laugh a lot – children love humour. Be prepared to laugh at yourself
 - Be fair
 - Be organised – you can’t be organised enough
 - Be a mentor
 - Allow children to enquire and debate
 - Solve all problems by end of day – don’t take them home
 - Teach self-responsibility – to take pride in their creative work
7. The Use of Simulated Activities eg. Computer virtual reality, is widely recognised as an important tool for developing creativity – they stimulate, they’re hands on and they motivate eg. Following someone sailing around the world. Virtual simulation enhances children’s excitement – computers enhance this simulation. More and more also web simulations are being used by teachers. Simulating actually could involve being someone doing something ie. Pretending to be a survivor in the mountains or turning the classroom into a different setting eg. under the ocean, a sports zone, a Maori pa site. The use of props and costumes helps create the illusion. The more realistic the education activity the more likely that what you are teaching will be remembered. Find out what excites your class (it may not excite you)
8. Create learning Goals but don’t go overboard. Children need to see they are going down their own pathways

9. Questioning Skills – make questioning a part of daily classroom exchange. It is important that children learn what questions to ask and how to ask them. Children need to be free to ask questions. Teachers need to use good thought provoking and interesting questions. Remember to use a variety of questioning techniques – this is the teachers main way of talking to the children. Reflective questions are great and use open ended questions eg. If you were in this position what would you have done and why? The creative classroom is one where you would hear lots of children’s questions, and lots of children’s ideas – only then can children initiate learning. To be creative you need to ask questions and be able to tolerate the not knowing that goes along with this (Claxton – Inquisitiveness). Allow children opportunity to express divergent thought. Children should be allowed to disagree with their teacher. Encourage children to find more than 1 pathway to the solution. Allow children to define/redefine problems. Have children choose their own topics, choose their own ways of solving problems and once the problem is defined or redefined, it is time for children to generate ideas and solutions. The environment for generating ideas must be relatively free of criticism. Identify and encourage any creative aspects of ideas present and suggest new approach to any ideas that are simply uncreative.
10. Include plenty of Arts in your programme. Most art has content that is about something and therefore integration with other curriculum areas is easy. Art needs to be part and parcel of every school subject eg. In Maths – children will create a design, employing repetition of patterns, based on 3 different kinds of insects. John Dewey wrote in 1934 – “Art -the mode of activity that is charged with meanings capable of immediately enjoyed possession – is the complete culmination of nature and science and is properly a handmaiden that conducts natural events to this happy issue”
- Have a wide ranging Arts programme in your classroom. Children love live theatre, plays and drawing. Interweave the various arts (dance, drama, visual art and music). Integration in the arts is legendary. For example – a book by Isherwood was adapted into a play which later became the Broadway musical ‘Cabaret’. Integration of the arts in Social Sciences, Science, maths, reading and health adds richness, new meanings and excitement for learning.
- Sketching is a key form of media to help develop creativity. Having a sketchbook permits primary children a forum in which to express their ideas and feelings. Children should also be encouraged to use their sketchbooks for diagrams and pictograms – not just for sketching.
- In Science – use drawing as much as possible – drawing specimens, mapping, charting and illustrating experiments.
11. Develop an interactive classroom where children have positive interactions with one another. (See section 6)
- Claxton mentions this as one of his 8 important points for developing creative capabilities. Positive interaction between children and teachers and children and children are vital.
12. Integrated learning is the key - With meaningful learning contexts
- With deep engagement
 - With problem solving encouraged
 - With complex thinking being seen

“But is rich deep learning an ideal rather than a reality.” – Gawith. All too often Inquiry learning is shallow because far too much time has been used focussing on literacy – numeracy achievements. We need to give time and slow teaching to as Gawith says – “crisscross the territory” - coming at something from many different angles: Hammond states that Literacy and numeracy programmes need to be reframed and integrated into the Inquiry process. Literacy and numeracy need to be taught in realistic contexts so children can seek, use and create their own knowledge eg: Children and enthusiasm for science can be used to help them progress in literacy and numeracy and further develop their key competencies. We need to stimulate children by helping them think across subjects and disciplines. A creative introduced ‘Rich Topic’ is the best approach – as it involves all curriculum areas, involves the senses and is aware of different learning styles. Have fun. Have a great lesson.

13. Include Science and Social Sciences in your programmes (integrate). These curriculum areas serve as vehicles for good language with science and social science benefiting as well.

In 1964 in Richardson’s work ‘Early World’, Richardson pointed out that work was based on an awareness of the natural world involving careful scientific observations and a demand for personal and excellences of their idea in whatever medium used. “The child were his teachers as much as he was theirs”

14. Allow children to use their imagination. This goes without saying. Imagination is one of Claxton’s 8 sections of the learning orchestra that contributes to developing creative capabilities.

Imagination according to Adrian Reznik –“is the eye of the mind”, “It is the formation of mental images that allows us to see absent objects or situations as being present. Imagination helps us to think outside the square; to be able to picture the written word.

Children need to be able to put themselves in another place, another time, another era, another occupation. They need to be able to imagine other’s viewpoints – imagine themselves in other people’s shoes. This helps children to understand respect and respond to other children’s points of view.

Children love to role play. We all remember Cowboys and Indians (and forget all the PC stuff). We all remember our children playing with cardboard boxes – they became homes, castles, hospitals. Children have a natural capacity for living deeply within their imaginations. It helps them to develop their unique personality, beliefs, strengths.

We need to keep these imaginations fuelled up in our classrooms through the arts (especially music/drama) but also through free play – there is nothing wrong with a bit of extra free play here and there. Children enjoy the freedom.

Boys especially need projects that fire up their imaginations. Joesph Driessen in his talks refers to Ernest Shackleton’s adventure – What better way to allow children to imagine.

Children love to dress up eg. As book characters. Let them examine all sorts of items. Collect and store objects and have them ready to use. Show and tell is great for imaginations – amazing toys, technology toys, historical items rather than the old morning talks (but don’t discount these either). Ask children to guess what an item is for example (an unusual object)

Children need to be immersed in experiences (another of Claxton's 8 sections of the learning orchestra that contributes to creativity). Appeal to the children's affections (Some of you may like to look at Kelvin Smyth's 'Affective Inquiry Approach')

15. Read and Write with Emotion. Read to children of all ages. Children love a good book. When reading let your emotions run wild. Act out parts, use funny voices – they stimulate imaginations. Emotion is important for expressive learning – story telling, reading as emotive book eg. Ernest Shackleton. Learning centres are good ways to arouse emotions.
Write creatively often – get children to tell how they feel; what they are thinking about.
16. Use stimulating classroom environments. I have visited many 'boring classrooms' lacking stimulation, lacking well presented art work. It does take a bit of extra time – but it's the children's room as well – get them fully involved.
17. Modelling is a key component of learning to be creative. Children learn from others – they imitate (Claxton). Teachers need to model strategies for thinking in new ways. Modelling stimulates others to arrive at their own individual solutions. Be a role model. Children develop creatively when you show them. You can not be a role model for creativity unless you teach and think creatively yourself. Help children believe in their own ability to be creative.
18. Solicit a high volume of different ideas. . Accept children's ideas – don't structure children's ideas to fit the adults.
19. Share your passion with the children – whether it be rugby, tramping or gardening.
20. Tolerate ambiguity – people like things to be black and white. There are a lot of grey in creativity. A creative idea tends to come in bits and pieces and develops over time
19. Joy is an important emotion; and the current emphasis on standardised testing and rote learning encroaches upon many children's joy. In their zeal to raise test scores, too many policy makers wrongly assume that children who are laughing, interacting in groups or being creative with art, music or dance are not doing real academic work. We need joy in our classrooms. If we scrub joy and comfort from the curriculum, we distance our children from effective information processing and long term memory storage – children become bored and anxious and start to feel bad about school (lose their joy)
Children's comfort level can influence information transmission and storage in the brain (Thanos 1999). We need classrooms of exuberant discovery (Kohn 2004). Classrooms need to be full of novelty and stress-free. Lessons must be more personally interesting and motivating.
20. Reward Children for creativity. In my research I have come across varying thoughts on this. There is some research to suggest that incentives with the creative process, reduce the quality of children's responses and the flexibility of their thoughts.

Teachers find this hard – they are natural reward people – but teachers should allow children to develop mastery of creative activities that they are intrinsically motivated to do; rather than trying to motivate them with rewards and incentives.

Perhaps rather than say don't reward – perhaps we should delay rewards – let them work on a piece of work for a long time without immediate reward. The greatest rewards are often those that have been delayed. Hard work does not bring immediate reward. But do give thoughtful attention to children's work – children like to know that their work is being taken seriously.

Concentrate on the process of generating (V evaluating) new ideas. Encourage children to make mistakes and fail. Our classrooms need to be places where risks are taken. Children who are afraid of failure and judgment will curb their own creative thought. When children make mistakes, ask them to analyse and discuss these mistakes. Often weak ideas or mistakes contain the germ of correct answers or good ideas.

21. Celebrate children's work – especially their innovation and creativity – cover classroom walls with attractively presented art work.

22. Practice Flexibility (Body and Brain)

- Ambiguity
- Choice
- Lateral Tangents
- Spontaneous Tangents

PART 2: The Importance of competencies in Creative Teaching and Learning

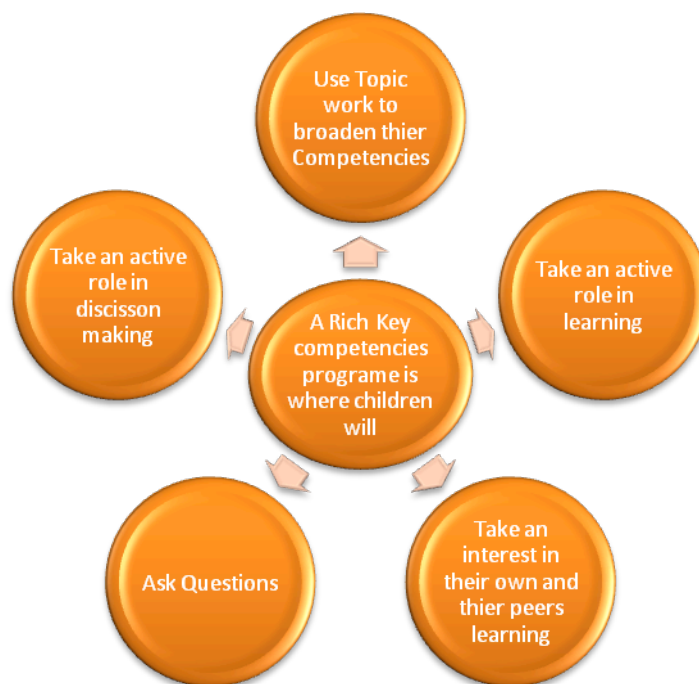
The new Curriculum has given us the idea of key competencies – a very vital aspect of creativity. Key competencies matter – they support how young people learn now and go on learning throughout their lives.

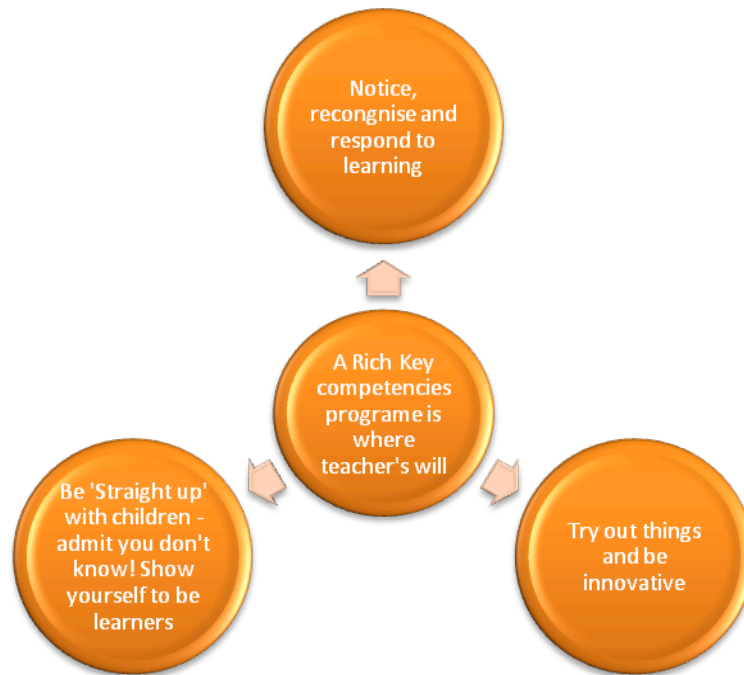
Schooling Claxton writes is about ‘helping all students become brave and skilled explorers, cunning detectives, imaginative creators and tough competitors. School needs to be inspiring’. Claxton wants students ‘to come at life venturesome, imaginative and questioning’. These are the key competencies in our new curriculum.

The New Zealand Curriculum advice – “Doing fewer things well and digging deeply in study topics” is sound advice. Children need to set goals for themselves and peer assess these goals. This reinforces the idea of children’s ownership and self-management of the learning process.

Key Competencies support Creativity

Key Competencies underpin everything that happens in teaching and learning.





Principles which Underpin the Key Competencies Support Creativity

- ACTIVE – Children are doing and generating knowledge through their participation
- REAL/PURPOSEFUL – Children interact with others in real, authentic context
- RELEVANT- Learning is relevant to children’s lives now
- EMPOWERING – to develop children learning dispositions – their desire, inclination and will to learn

The Key Competencies are exciting – they are interwoven within the fabric of the New Zealand Curriculum. They bring with them exciting possibilities for creativity – engaging, meaningful useful experiences. They challenge teacher’s to think differently about what, where, when, why and how we learn.

The Key Competencies don’t need to be assessed and they are mainly in teacher’s minds, their lesson objectives, their unit evaluations – but not on individual children’s reports

Conclusion

Creativity is not about concentrating in the primary school curriculum on literacy and numeracy. We need holistic education – education to use the gifts of imagination.

Sir Ken Robinson says “all people are creative; you can be creative in any field. In tomorrow’s world creativity will be as important as literacy and numeracy”

There is a need for personalised learning in our schools. Children need to be at the centre of their own learning and be engaged in real problems. We need creative teachers – who recognise every learner’s world. They need to create situations which allow their children to ask why? They need to value children’s imagination. Creative teachers need to be in the fore in New Zealand.

Phil Gates once said “Creative people are more flexible and better problem solvers, which make them able to adapt to technological advances and deal with change. Creativity and imagination is what we look for in our work force” – Phil Gates

A School or teacher or class will not suddenly become creative. At Takaka Primary School we will move towards creativity – our curriculum is a great start. The pull of National Standards and especially the push for ever improving achievement in literacy and numeracy will require teachers to take risks and Principals will need to create the conditions to protect them. We need to slow down the academic inflation. We don’t need academic ability to dominate our views of intelligence.

ERO (Education Review Office) need to be made fully aware when they visit of the direction the school is taking. National Standards won’t raise achievement. Creative teacher’s that help children towards a creative path and resist National Standards will. Our Schools are driven by the Ministry of Education planning requirements and perceived ERO expectations. It is easy for the government to gain the popular vote with catch cries to engage the ill-informed, but I repeat National Testing in whatever guise will not improve learning outcomes for children. We need personalised learning giving parents and children assessment feedback (using what we have) so children can built on their strengths.

And to finish, John Dewey wrote “Nothing much of lasting values happens in education unless students minds are engaged in ways that connect with their experiences” True and our New Zealand Curriculum has given us a ‘vision of young people as life-long learners who are confident and creative, connected and actively involved. The New Zealand Curriculums prime function is to set the direction for schools to help all their students develop the key competencies’ A great vision – let’s not spoil it. Any change is difficult, but let’s give it a go. Network with other ‘creative schools’. Keep true to your beliefs. It is not a short process becoming a creative school.

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Many Articles and books have been read. I make no excuses for repetition; or using other people's ideas – it all helps the sharing process and in the long run creativity.

Special Thanks for a Workshop at our School by Bruce Hammond and his advice on some matters – I have appreciated and enjoyed his passion for creativity. Many aspects of this research have been included in Takaka Primary School's Curriculum – a curriculum which will change, a flexible curriculum. Takaka Primary School teachers are in the early stages of developing creative capabilities in the classroom – but I have seen great

signs and I must thank the dedicated and hard working teachers of Takaka Primary School for their input.