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The Research Journal for Cook Islands Educators



Research by Cook Islands Educators

Crocombe, Ron, and Marjorie Tuainekore Crocombe. 2003. Akonoanga Maori – Cook Islands CULTURE Educational Characteristics of the Cook Islands, 1986. Rarotonga, Cook Islands: Statistics Office, 1991.

(News, National gender equality, 2019) <u>https://www.pdhre.org/rights/</u> women\_and\_education.html

<u>"Papa Mana Strickland: A Bastion of Education"</u>, Ministry of Education of the Cook Islands, 2008-12-15

## Conclusion

In conclusion education is vital to support women and close the gap between women and men with respect to socioeconomic opportunities. Education can ease disparities grounded on gender and adjust the past legacy of drawbacks challenged by women. Making a specific obligation to advancing the education of girls and women produces a remarkably great social and monetary profits. Women who are educated devote more in their children and add to the well-being of the next generation. They are more likely to give in the labor force, allowing them to vield an income now and assert their rights, and accomplish greater inspiration in the domestic and community living. (Affirmation, 1996) Indeed, in a world in which creativity and knowledge play an ever greater role, the right to education is nothing less than the right to participate in the life of the modern world.... The priority of priorities must ... be the education of women and girls.... There can be no enduring success in basic education until the gender gap is closed." But we have to do more. According to the Vice president of the National Council of Women (NCW), Henrica Wilson Marona, "We are ready, the women of this nation. We are ready to embrace all types of women. We are the flowers of this nation."

# **REFERENCES:**

Arnell, D. and Wolk, L. 1993 Visions of the Pacific

Beijing Platform for Action, paras. 69, 80, 81, and 82

https://www.pdhre.org/rights/women and education.html

Cook Islands Statistics Office, Ministry of Finance and Economic Man-

agement <u>http://www.mfem.gov.ck/images/documents/</u> Statistics Docs/10.Other-Information/Cook-Gender-Profile.pdf

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#### Marjorie Tuainekore CROCOMBE

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Marjorie was born in 1930 and comes from the island of Rarotonga. Education for her started n Rarotonga and was given a scholarship to complete high school and attend Teachers College in New Zealand. She was the first Cook Islands woman presenter at the Cook Islands Teachers Centre. Marjorie spent a great part of her young life at Universities pursuing higher qualifications and completed her Bachelor in Education at the University of the South Pacific (USP) and her Master's in Education with the University of Papua New Guinea (UPNG) She was a founder of the South Pacific Creative Arts Society, a member of the Biodiversity Committee and the Education Review team. Currently she continues to be on the Higher Appointments Committee and the Cultural and Historic Places Trust. In retirement in Rarotonga she is represented on many committees and very involved in organizations and activities. She is the wife of the late Ron CROCOMBE.



### Mereana TAIKOKO

Mereana was born in Aitutaki. She was educated in Rarotonga and later in Auckland. Her academic merits and awards conveyed many rewarding qualifications in her teaching and nursing careers. After years working as a psychiatric nurse in New Zealand she returned to the Cook Islands where she took on the role of principal tutor for the Cook Islands School of Nursing. Later she became so involved in voluntary work (secretary, board member, committee of several organisations – Hospital Comforts, Cancer Support group, SPCA and Punanga Tauturu). She has represented the Cook Islands and has travelled globally at conferences targeted at health and women issues.



Anna Pokino, in her teaching observations, has noted a gap between her students' acquiring new knowledge and the practical application of this knowledge into their daily lives. In her journey to uncover an effective teaching and learning environment for her Mangaian students, that enables them to transfer knowledge into practice, Ms Pokino unpacks the assumption 'that knowing what to do is a directive to an affirmative action'. Her *literature review "Knowing and Doing"* examines a series of teaching and learning practices alongside the "traditional, cultural" Mangaian teaching and learning practices to determine their implication for learning and doing.

Mike Papatua, of Mangaian descent and principal of Apii Mangaia is passionate in his concerns for the continuing trend of Mangaian youth migrating away from their homeland to seek their future elsewhere. In his research proposal *What is an appropriate curriculum (vocational/academic) for students on Mangaia that will meet the needs of the island?*, Mike makes a bid to discover a curriculum that will stem this trend and offer relevant opportunities in their localized environment. Mike enlightens us with the development of the Cook Islands education system from the tradition methods through to the present day focus. He challenges the "introduced" epistemology and highlights recent educational developments. Furthermore, Mike offers up a Literature Review that seeks an indigenous and local based solution that will nourish and sustain the unique, Mangaian way of life.

Words to use -- nourish sustain stand strong - kuru



# Knowing and Doing

# **A Literature Review**

# Anaseini Pokino

Knowing and doing are often interpreted by many as the same or interchangeable. There is general assumption that if you know what to do, then that acts as a directive to an affirmative action. This is far from what occurs in reality. The purpose of this literature review is to examine the emerging thoughts and studies that currently exist regarding this topic. To bring it closer to home, recently while teaching my Year 10 students on principles of effective waste management, I noticed the gap. While they enjoy the discussions, the homework, test and field trips, the majority of my students have not practised this new knowledge in their home.

Several literatures, one specifically by Quay, address the two tales of knowing how and knowing that. He examines in his article that the two dimensions while are of opposing nature, co-depend on each other. Quay is resolved in his view that learning by doing combined with reflection proves to be more effective. When people consciously reflect upon what they have learnt and apply further analysis, habits begin to evolve around the newly found knowledge.

In addition to Quay's general observation, numerous Pacific educationalists point to a cultural dimension to this issue.

There is a paradigm shift towards culture playing a pivotal role in learning and teaching. Konai Helu Thaman discusses in detail the opposing worlds that students are faced with in their learning. In her article titled Sociocultural context of education in Pacific Island countries, schools are shown to be culturally undemocratic, with the majority of Pacific schools adopting foreign curriculum and systems. Often schools are viewed as a site of struggle by Pacific Island (PI) students, resulting in cultural conflicts, detention and competition. Thaman also shows that emphasis is placed on examination as the main determinant for competency.

# 3. Vaine WICHMAN

Vaine was born in Rarotonga where she did most of her primary and secondary schooling. From there she commenced a BA in management at the University of the South Pacific in Fiji. Later she started an MSc in economics and development in the United Kingdom at the Bradford University campus. On returning to the Cook Islands she continued in the economics and development area and focused on planning for the Cook Islands government. She spent a lot of her time as an economist for the South Pacific Commission and later set up a consulting company working nationally and throughout the Pacific. She represents the island of Penrhyn on the Cook Islands National Council of Women and was appointed as Executive Officer for the island for three years. Vaine appreciates innovative writing and has two published poetry books (Maiata and Te Ava Ora) and has numerous individual poems and short stories in a number of journals. She married Arama Framhein Wichman a musician originally from the island of Mauke and they live on the island of Rarotonga.



#### 2. Verera Ngarangi Valerie Teariki MONGA – MAEVA

Verera was born on the island of Aitutaki. Education for Verera started in Aitutaki, Rarotonga and then to the University of Auckland in New Zealand. She later married her husband from the island of Mauke who was a trainee doctor at the time. She served the Cook Islands Public Service Commission for over sixteen (16) years and later devoted her time working full time for voluntary organizations. A founding member of the National Council of Women she was president for ten (10) years. She also held other presidency positions including the Cook Islands Associations of NGO's, (CIANGO) Director of the Pacific Concerns Resource Centre, the Asia Pacific Bureau for Adult Education and Asia Pacific Watch. On the island of Rarotonga she holds chiefly titles, is an advisor to Puaikura Vaka Womens Council and a board member of the Cook Islands Music Association. Verera is a renowned musician, dancer and a composer of songs and chants.



The out of school realities for PI students is that life is determined by family, parents, aunties and cousins. Relationships such as church youth events, string bands and other community initiatives determine task; not the clock. Children are prepared for adult life based on everyday life experiences. Learning how to farm, cook, fish and the system in which a home is run daily, determines order of task and priorities. Curriculum is driven from pacific culture epistemologies as opposed to school western epistemology.

The school realm clashes with the out of school realms. Students are faced with a foreign environment. Hence, the gap of knowing and doing is further created and widened.

Pfeiffer and Sutton of Stanford University also studied elements affecting worker's productivity. They determined that fear and discomfort cause workers to rely on pre-existing norms and unconsciously makes decisions without taking into account realistic context and factors that are necessary to effectively troubleshoot. This is a view of the culture at work. Workers, like students, are faced with a foreign environment. In some organisations, technological revolution, heavy reporting and documentation processes provide complexities that workers fear and avoid.



Similarly, studies revealed that schools in Pacific countries need teachers to be culturally competent to be able to effectively teach students. Many likened Pacific educators are voicing out similar concerns in an effort to break free from the pre- existing colonised systems that runs most schools. These systems came about during the missionary days. They are heavily loaded with Western epistemologies and values that are foreign to indigenous students. This can be found in Thaman's article, Quality teachers for indigenous students: an imperative for the twenty-first century. *The International Education Journal: Comparative Perspectives.* 

There is another interesting element where Pacific Island educators are *'rethinking'* Pacific Education Thinking in an effort to structure a system that is culturally democratic and collaborative with out-of-school realms for students. Quay's article also views reflection as an element necessary for students to be able to learn and reflect what they have learnt for it to take roots.

Wohldmann of California State University examined layers of complexities between knowing what certain implications are and the decisions based on actions. She identifies the learning tasks together with transfer of learning. Her study of positive transfer of learning into action shows evidence that seeding of knowledge base can encourage positive actions. Wohldmann argues that seeding must be conditioned if it is to improve retention and transfer of knowledge into actions. Wong et al, highlights that effective practises must be sensitive to important social context on meaning and language. Their views, focus closely with the reasons why decisions and actions are based on the need to feel and belong to a community. This further supports the culture aspects as seeding condition.

In the article 'A reflection on 'being' 'Fijian' and 'belonging' to Fiji: Conceptualizing a value-theory approach to Citizenship Education' by Cresantia F K Vaka 'uta, Vaka 'uta talks about Citizen Education as a way to bridge the gap created by a contrast between Oceania education and modern technology (Thaman). There is a lot more focus already created on the need to dwell more on teachers and institutions that train our teachers in the Oceania region.

#### 1. Jean Tekura ii moana CHAPMAN – MASON

Jean was born on the island of Rarotonga with both parents now deceased. Dick Chapman an Englishman and Akekaro Kairae from the island of Mauke. Jeans early schooling years started on the island of Mauke before moving to Rarotonga. From there she moved to New Zealand where she completed qualifications in hotel management at Canterbury University. She also worked for seven years as an internal auditor and managed a number of hotels in Auckland and Wellington before returning to the Cook Islands to live. She took on the position of information and research officer with the Cook Islands parliament and is now the current curator with the Cook Islands Library and Museum. Jean loved art and grew up in a family of artist where her two grandmothers were both skilled weavers, her mother a textile artist, her uncle a master builder of outrigger canoes, her brother a professional artist and art teacher and her sister a porcelain painter in France. She has written and circulated an assortment of poems under the title Tatau (Tattoo) and is a member of the Cook Islands Taunga Writers Society.



It is important that we all work together to make positive gains. As women and mothers we must be weary of the power of our words upon our children, and use positive words of love and encouragement as our girls will one day become mothers, partners and wives and our boys, husbands and fathers". The National Gender Equality and Women's Empowerment, (NGEWE) and the National Disability Inclusive Development, (NDID) Policy 2019 – 2024, aim to speed up parity for all women in the Cook Islands. The Cook Islands National Council of Women (CINCW) President, Vaine Wichman endorses the United Nations subject of taking gender equality to a higher level and inspires the CINCW and associate members to endeavour with instigating at the island level the National Gender Policy and specially support to act within community programmes and increase the number of our young women to take up the challenge of island and national authority duties and cautiously invest women in the proposal and operation. The council have confidence in that concentrating on these areas will definitely lead to developments to empowering women. (Aid, 2014) stress the improvements seen in the status of women in the Cook Islands in the number of women in politics, decision making, advising services, profitable events and at primary and secondary teaching. Key statistics include: Leadership and Decision Making – 17% of Cook Islands National Parliament is made up of women (5 out of 24 members including Speaker of the House); 48% of management and decision – making. Sponsoring women in governance in formal and informal seats as well as across the community and private divisions has been a long-lasting encounter in the Cook Islands. Hon. Nikki Rattle, Speaker of the Parliament of the Cook Islands defines that the deep-rooted principles of enterprise should enlighten how leadership should be carried out. (women, 2018) Data accessible from the Women in Leadership Roadmap Synthesis Report recommends that plans and approaches to uphold leadership for women need to be set and encouraged at island level, surrounded by families and inclusive of the community and traditional settings.

Discussions with and literature read reflects the state of education over the years in the Cook Islands with five (5) women: Jean Tekura I'I' moana CHAPMAN - MASON; Verera Ngarangi Valerie Teariki MONGA – MAEVA; Vaine WICHMAN; Marjorie Tuainekore CROCOMBE and Mereana TAIKO-KO There has been extensive research in the role culture plays in education. The contrast identified by Thaman between Oceania and modern education, the tension between Quay's study between knowing and doing and various readings such as workers productivity dependent on the state of the workers reveals that you need to work with simplicity and familiarity to be able to connect and apply new knowledge into action. Therefore, I am interested to find out first hand primarily how we can work with students in Mangaia to apply what has been learnt in the school in a close knit relationship with the home. I would like to measure positive impact in the home by gathering the necessary information that is required to make informed decisions about how a student who actively participates in class during a waste management class can then go home and apply some of the principles learnt in class.

### References:

Thaman, K.H. (2013). Quality teachers for indigenous students: an imperative for the twenty-first

century. The International Education Journal: Comparative Perspectives, 12(1), 98-118 ISSN

#### 1443-1475 www.iejcomparative.org

Vaka'uta C.F.K. (2011). A reflection on 'being' 'Fijian' and 'belonging' to Fiji: Conceptualizing a

value theory approach to Citizen Education. Pacific- Asian Education. Vol. 23, No. 2, 77-88

Thaman, K.H. (2001). Towards culturally inclusive teacher education with specific reference to

Oceania; International Education Journal Vol 2, No 5, 2001

Wong, D., Pugh, K., Dewey Ideas Group, (2000), Learning Science; A Deweyan Perspective.

Quay, J. Knowing how and knowing that: a tale of two ontologies.

Pfeffer, J., Sutton, R. (2000). The Knowing Doing Gap, Harvard Business School Press.

Wohldmnn, E., (2014). Examining the Relationship Between Knowing and Doing: Training for Im-

proving Food Choices. California State University, Northridge.

Thaman. K.H (Ed). 2009. ., *Educational Ideas from Oceania; Second edition*. IOE/USP, Suva. Fiji. This is a book that is edited by Thaman, K.H. The rest of the names that appear here are authors of different chapters.



What is an appropriate curriculum (vocational/academic) for students on Mangaia that will meet the needs of the island?

# Michael Papatua



Committed steps were put in place to have planned goals, complex and identical admission to education, the terminating of the masculinity and femininity gap in schools, the expansion of non-prejudiced education and the implementation by way of using courses, manuals and teaching resources free of sex-labelling. Millennium Development Goals (MDG) 2 and 3 calls for Universal primary education and promote Gender Equality and Empower Women in order to remove gender discrepancy in primary and high schools, preferably by 2005, and at all levels of learning before 2015. *UNESCO* through its programme on the Right to Education improves, endorses learning standards and principles therefore nurturing the submission of the privilege to education at country level and develop the objectives of the Education 2030 Agenda

The Cook Islands has seen some significant developments in the rights of women and girls and their involvement just as in the expansion and progress of the country over the last 50 years. In contrast with universal gender indicators, the Cook Islands has been trailing directly above average in education and health services to women. Profile for men and women and their standing in society was analytically assembled and managed for the first time by the Cook Islands government and the information will be used consistently in all the productions of the countries numerical scheme in the future as initiatives to be implemented by non – government groups. The Cook Islands Gender Profile 2012 is planned to complement the valuations in existence in the execution of the Cook Islands National Policy on Gender Equality and Women's Empowerment. (GEWE) The policy reports serious features of life which includes families, education, work and decision-making contrary to women. It shows that improvement in guaranteeing the equal position of both genders have been attended to in the numerous capacities which include school. It emphasizes clearly that there is a great more that is required to be finished in order to close the gender gap in which women are exposed to. The policy also notes the great importance of the resilient cultural views and customs that safeguards women's stance and allow their voices to be heard. (News, National Equality Gender, 2019) Ministry of Internal Affairs (INTAFF) secretary Anne Herman stated, "Collectively everyone everywhere can strive for women's equality and continue to make positive gains ..... It is important that we all work together to make positive gains.

1990 girls on average had progressed ahead of boys especially at the senior level in most high schools. The Cook Islands Statistics Office, Ministry of Finance and Economic Management in their findings also acknowledge that girls were achieving better but boys had a variety of resident preparation prospects than girls. Women slowly elevated in positions held in the public service sector. By 2000 five of the 22 government ministries were administered by women. Other major changes included the following: forty four percent (44%) of the total government staff were women; two (2) of the elected twenty five (25) parliamentarians; forty one percent (41%) of paid employment; fifty nine percent (59%) of most professionals were women. In the business sector over half of businesses recorded were held and managed by women. The University of the South Pacific (USP) reported in 2001 that 81% of students enrolled for degrees and diplomas were women and of the six students who enrolled for law degrees, (80%) five were female.

Education for years has been renowned as vital, with persuasive values for people improvement and for the growth of the world. The right to education is declared in the Universal Declaration of Human Rights and numerous global treaties. According to Article 26, "Everyone has the right to education. [Elementary] education shall be free... compulsory. Technical and professional education shall be made generally available and higher education shall be equally accessible to all on the basis of merit.... Education shall be directed to the full development of the human personality and to the strengthening of respect for human rights". (Declaration) In accordance with The United Nations Human Rights Office of the High *Commissioner*, "education must be all-encompassing and available to girls and boys, women and men, in law and in practice." The World Declaration on Education for All, Preamble and Articles 1 and 3 states that "Education is a fundamental right for all people, women and men, of all ages, throughout the world... The most urgent priority is to ensure access to, and improve the quality of, education for girls and women, and to remove every obstacle that hampers their active participation. All gender stereotyping in education should be eliminated." The Beijing Platform of Action of the UN Fourth World Conference on Women in 1995 documented education as an elementary human right and a crucial device for accomplishing more equivalent associations amongst women and men.

# 1.0 Introduction

Mangaia Island is faced with a serious migration problem having lost 75% of its population over the last 30 years. This continuous trend of out-migration especially among school leavers, is having serious consequences for our local economy, the local labour market and the maintenance of local infrastructure.

This research examines some of the literature on Cook Islands out-migration with particular focus on Mangaia Island. It examines the relationship between the education curriculum and the livelihood strategies of young Mangaians. It explores the question of whether the current education curriculum provides young Mangaians with the skills for out-migration or the skills to create a future on their home island. The possibility of both goals being encompassed in the curriculum is also examined.

To that end, the review examines literature on 'place-based education' and 'education for sustainable development", and in particular whether indigenous knowledge creation, reasoning and critical thinking can provide understanding and opportunities in the modern western world. Consideration is given to recent developments towards increased prescription of education outcomes by the Mangaian community. Based on this review, an action research project is proposed to monitor and evaluate the outcomes of an increasingly place-based education curriculum on Mangaia.

A number of island-wide consultative meetings (Te au Puna o Mangaia, 2014) identified the need for a more appropriate school curriculum that addresses the island's current development needs and encourages with training in hospitality, carpentry, plumbing, tiling, mechanics, agriculture, electrical, horticulture, computing, enterprise, fishing and marketing to prepare young Mangaians for local employment in home production (jewellery, carving, arts and crafts, as builders or mechanics, or fish and food producers for the local market). The consultations requested a change from the current academic curriculum to a predominantly vocational curriculum, with adequate on-island training and employment for school leavers. This study will examine this matter in more detail and make recommendations for action by the school in response to this community request.

# 1.1 Background to the Problem

According to Battiste and Youngblood (2009), the animation of Indigenous knowledge in teaching and learning is a growing field of inquiry for educational innovators and problem-solvers. As Indigenous knowledge academics reveal the richness of Indigenous languages, experiences, and worldviews, the potential to transform learning for underserved populations is promising. Yet, epistemological barriers exist that institutionalize thinking in contemporary schools across the globe. Throughout history, Eurocentric or Western knowledge systems have been positioned in dominant opposition to Indigenous knowledges (Battiste & Youngblood, 2009). Thus, the introduction of global, ICT initiatives within unique contexts such as the Cook Islands, where there is tension between Western and Indigenous ways of knowing and doing, requires careful understanding of teachers' perceptions of uptake. The context of this study includes a discussion of Indigenous knowledge, the Cook Islands context and education system, and global perspectives of Place Based Education.

#### **Cook Islands Context**

The Cook Islands Ministry of Education's (CKMOE) Education for All (EFA) report (2014) provides the context within which the education system is situated. The Cook Islands consist of 15 islands scattered over some two million square kilometers of the Pacific Ocean. The islands lie in the center of the Polynesian Triangle, with Niue and Samoa on the west and Tahiti and the islands of French Polynesia to the east. The Islands are divided into the Northern and Southern group, with a total population of approximately 14,000.

The island of Rarotonga, which sits within the Southern group is considered separate from the rest of the islands, or Pa Enua (outer islands). Rarotonga holds the majority of the population, tourism industry, and government administration. The Southern group consists of seven islands, all located within 200-300 kilometers from Rarotonga. The Northern group consists of Palmerston Island, 500 kilometers from Rarotonga, and six other islands between 1000 and 1400 kilometers from the population center. The following statistics show the breakdown of the population: 58.6% of population resides on Rarotonga, 28.39% reside in the Southern group, 12.85% reside in the Northern group.

makers of the time assumed that it was not a requirement for Cook Islanders to aim towards universal standards in education.

During the Colonial period, New Zealand acquired accountability for the Cook Islands economic and social services policies and goals. Services to education were improved and made better than before. This was evident in 1936 where 96% of all children attended school. New primary schools were built in Rarotonga, (the capital of the Cook Islands) junior high schools were established in the Southern group islands of Aitutaki and Atiu for Year 8 and 9 students and in 1954Tereora College was restarted under government funding. In accordance with the book "Visions of the Pacific" (Wolk, 1993) the Cook Islands has one of the best wide-ranging education systems in the Pacific now with Early Childhood Education to Tertiary tuition available throughout the country. Since Self Government in 1965, many agencies and advisory units have taken education to a higher level in the development of curriculum in all year levels. The close connections with the New Zealand educational system meant primary and secondary education are free and compulsory for children between five and fifteen. The New Zealand Government Scholarship Scheme have created greater opportunities where bright children are sent overseas for further studies. While knowing the worth of the New Zealand educational system, the Polynesian Way Review in 1989 appointed by the Cook Islands Party incorporated a continued drive towards equity admission to education at every level, modification of curriculum in meeting resource reguirements and the delivery and implementation of guality education. Women's roles continued to be mainly domestic. In the 1930s a small number of girls were sent to New Zealand for further studies but was only chosen according to their chiefly status and not on their academic abilities. From 1946 changes to policies allowed a substantial number of girls to be chosen on excellence and were sent to universities and colleges in New Zealand. This started a trend and Cook Islands girls and women began to look further at other professions which included nursing, teaching and typing. Women became lawyers, accountants, diplomats, doctors and politicians.

In the 1990 massive changes came to the fore. After 175 years of formal education the rank of women had intensely changed. While boys outperformed girls at all levels, the change became evident in the 1970 and by

coverings for the floor area, fans, trays to carry food (*raurau*), baskets to store food (oini), coverings for the walls (tapakau) and skirts to perform dances.. The choice and research of resources for each article were wisely communicated so that the completed artefact will be of good value. Learning was informal and learned from experience through practical living and continued to be passed on from generation to generation. According to the book "Cook Islands Culture" ("Akono'anga Maori") (Crocombe, 2003) Nihi Vini one of the contributors echoes how education before the arrival of the Missionaries were informal and in order to preserve traditional knowledge, learning continued outside the school and grandparents were used as they were highly valued for their means of wisdom and knowledge in practical tasks. Teaching is verbalized and by showing or demonstrating. Children are the responsibility of parents in the home and are their first teachers. Nihi Vini continues to say that the learning, playing, eating, sleeping and day to day activities are all beneath the same roof or within the same "classroom walls." Therefore the young ones see elders and imitate that which is customary and proper.

The progress of learning in the Cook Islands fell under five distinctive periods. These comprised of:

- 1. Mission Period from the 1820s
- 2. Protectorate Period 1890s
- 3. Annexation Period early 1900 to 1915
- 4. olonial Period post World War 1 to 1965
- 5. Self government (1965) to now.

Education during the Mission Period was subjective by the Christian Missionaries and the way people lived were hugely changed. Churches were set up and recognized on the different islands and new methods of instruction and education were presented. The Maori language was categorized and subjects such as arithmetic and religious instructions were started. The London Missionary Society (LMS) started to validate the education of children. The Sunday school hall became the center for learning and much of the curriculum was to do with the bible. The learning was aimed at developing devotional attitudes and Christian behavior amongst children and adults. During the 1890s universal education grounded upon English language instructions was advocated by the British Resident Moss. From the early 1900 to 1915 these theories were overturned as decision Social demographics. According to the Cook Islands Ministry of Finance and Economics Management's (MFEM) (2011) census data, almost all of the resident population, 81% or 12,180 persons, identified themselves as Cook Islands Maori. Seven percent or 1,005 persons identified as part Cook Islands Maori, and 12% identified as foreign descent. The bulk of those persons of foreign descent identified themselves as New Zealand European. Table 1 shows the breakdown of ethnicities by island. Most persons of foreign descent reside on Rarotonga, while the proportion of Cook Islands Maori and part Cook Islanders was 96% on the outer islands (MFEM, 2011). Ethnicity rather than place of birth is used to estimate foreign-born population, since all Cook Islanders have New Zealand nationality, and many Cook Islanders are born in New Zealand (MFEM, 2015).

#### Table 1.

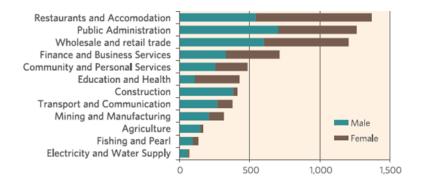
Resident Population by Ethnic Origin

	Cook Island Maori			Part Cook Island Maori			Other Ethnic Origin		
	2001	2006	2011	2001	2006	2011	2001	2006	2011
Rarotonga	7,886	8,146	8,060	676	891	8573	862	1,189	1,639
Southern Group	3,550	3,477	3,061	143	126	113	84	128	116
Northern Group	1,702	1,309	1,059	52	28	19	35	32	34
Cook Islands	13,138	12,932	12,180	871	1,045	1,005	981	1,349	1,789

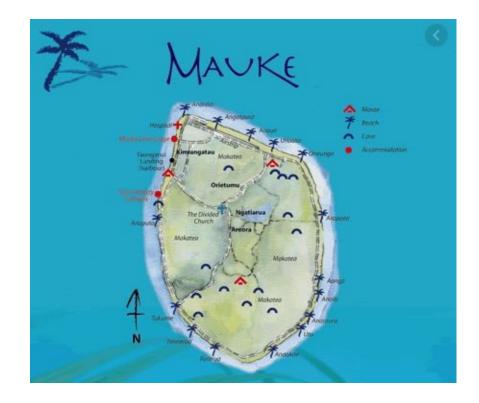
In 2011, the MFEM's census data showed that 55% of the total resident population lived in the same place where they were born. On Rarotonga, over 50% of the residents were born on Rarotonga, 31% were born overseas, 13% were born in the Southern Group islands, and 4% in the Northern group. These statistics communicate the transience of Cook Islanders across islands and abroad.

Economics. Cook Islanders possessing access to the New Zealand and Australian job markets has lead to a decline in population. As a result, labor shortages are often filled by foreign workers. In 2011, there were around 1,500 foreigners aged 15 or above living in the Cook Islands (MFEM, 2015). The following census data shows a more specific picture of the foreign worker population, which provides a clearer understanding of the international community within the Cook Islands: "About 16 percent of the labor force are foreigners residing in the Cook Islands. Most of these are from Most of these are from New Zealand (365 people; or 6% of the employed), Fiji (303; 4%), the Phillippines (158; 2%), other Pacific islands (French Polynesia, Kiribati, Niue, Samoa, Solomon Islands, Tuvalu, Tonga, and Vanuatu) (90; 1%) or Australia (59; 1%)" (MFEM, 2015, p. 16). Within the Cook Islands, two thirds of the jobs are provided by the private sector, roughly one third of the jobs are in the public sector, and a small percentage of jobs are provided by other civil society organizations (MFEM, 2015). Figure 1 shows the breakdown of employment in both the private and public sectors, offering a snapshot of the economic activity within the Cook Islands.

Figure 1. Sectors of employment, by number and sex of those employed as main activity, Cook Islands, 2011. From "Economic Activity and Labour Force: Analysis of the 2011 Population and Housing Census" by Cook Islands Ministry of Finance and Economic Management, 2015, p. 23.



According to the analysis of 2011 census data, almost two thirds (72%) of the 4,370 households across the country are engaged in agricultural activity, while 63% grow produce mainly for subsistence (own consumption) purposes (MFEM, 2016). Approximately one third of households engage in fishing activities across the country. In the Southern and Northern Groups, agricultural and fishing activities for subsistence are more common due to the high cost of importing goods.



Cook Islands history reveals that education for all starts in the home with elders and grandparents. This is exposed from our oral history and the knowledge shown by our elders in particular with such things as navigation; building of canoes; the accurate knowledge of the wave and wind actions; the phases of the moon in relation to planting and fishing. Most people lived closely in tribal settlements and traditional knowledge was provided orally by extended families. Boys were taught the skills of planting hunting and fishing and girls embraced the teachings and domestic duties of cooking, weaving and caring for family members. (Thaman, 2009) V, P. Mokoroa stated that the older and younger female required particular learning houses (*are orau*) where they would be taught the skills of making clothing from bark (*anga*) coverings for the floor area, fans, trays to carry food (*raurau*), baskets to store food (*oini*), coverings for the walls (*tapakau*) and skirts to perform dances.



# **Gender and Education**

# Teata Purea Ateriano

What does the history and development of education in your country say about the education of women? Write a critical analysis of the state of girls and women's education in your country. Provide supporting literature, as well as relevant statistics and examples to support your discussions.

One of the definitions of education is the progression of simplifying learning, or the procurement of knowledge, skills, values and beliefs. It conveys expertise and proficiencies that are fundamental to human growth thus enriching quality of life and adding to the diversity of benefits for both individuals and societies. According to Nelson Mandela it is the most influential tool we can use to change the world. This paper is in three parts. Part one looks to the past and part two at the growth of learning and teaching in the Cook Islands and how it transmits with the education of women. Part three offers supportive writings as well as data and samples.



# History of Cook Islands Education

Vai'imene (2003) explains the history of formal schooling within the Cook Islands. Without influence from foreigners, Polynesians occupied the islands for 1000 years and learned by watching, listening, and doing with others. In the 1820s, the London Missionary Society introduced formal schooling, which was accepted by Cook Islands leaders. With the missionaries' arrival, Vai'imene (2003) claims that the purpose of education materialized as the preparation for living in the world, not only island life. The missionaries gave converts the opportunity to learn to read and write in Cook Islands Maori, and by the 1880s almost all children were able to do so. As families converted, elements of culture such as tattooing, dancing, and marital relations were suppressed.

Supporting Scaglion's (2015) analysis of the historical patterns within the Pacific, in 1888, the Cook Islands became a British Protectorate. The first British resident, Frederick Moss, introduced a Public Schools Act in the belief that education based in English would promote democracy and economic development (Vai'imene, 2003). Thus, government schools were not to teach Maori language, and in 1895, the London Missionary Society opened Tereora College to support this initiative towards higher education. Vai'mene (2003) asserts that during this time "Cook Islands culture was treated as something for the home, and probably something to be 'overcome' with 'progress' and 'development'" (p. 170).

When the Cook Islands were annexed to New Zealand in 1901, the new Resident Commissioner, Colonel Gudgeon left education matters to the London Missionary Society. In 1915 New Zealand passed the Cook Islands Act, which shifted educational decision-making to administrators in Wellington, confusing the purpose of education in the Cook Islands (Vai'mene, 2003). For the first half of the 1900s, New Zealand Maori ministers controlled the education sector. According to Vai'mene (2003) the development of New Zealand models of education within the Cook Islands coincided with emigration of parents in the 1940s to provide educational opportunities for their children. As a response to this phenomenon, in 1955, Tereora College reopened as a state school staffed by New **Zealand** teachers. Pa Enua or outer islands children were selected via a quota system to attend the College, and students, as well as whole families, moved to Rarotonga. Scholarship systems sent children to church schools, but also secular colleges, universities, and tertiary training in New Zealand with the objective of those students returning as leaders within the Cook Islands community. Through these selection processes, fluency in English was subconsciously held in high esteem and linked to modern rather than traditional culture (Vai'imene, 2003). Increased migration from the outer islands for students to attend Tereora resulted in the placement of expatriate teachers within schools in the Southern group. Ironically, the foreign influence may have contributed to further migration (Vai'imene, 2003). In contrast, the Northern group of outer islands with few foreign influences retained more traditional culture.

Vai'imene (2003) explains that when the Cook Islands became selfgoverning in 1965, English was still the language of instruction with the speaking of Maori as a punishable offense. In the early 1970s, a Cook Islands Education Policy Statement was published by the Ministry of Health and Education (combined at the time), which stated that the purpose of education was to meet the needs, resources and environment of the Cook Islands. In particular, Vai'imene (2003) claims that the policy focused on the following: promotion of bilingualism, pre-schools and compulsory education starting at age 5, extension of secondary education, upgrading and expanding of curricula in all areas, the introduction of Cook Islands school certificates, interschool cultural and sports competitions, and the up scaling of professional training. In the years up until the 1980s, funding and the drive to provide meaningful education for all shifted discussions toward the development of Cook Islands Maori language and culture (Vai'imene, 2003).

Vai'imene (2003) states that access to and advancements in technology, coupled with tourism shifted previous educational advancements in culturally sustaining practices. First video and television in the 1980s and then computing and telecommunications in the 1990s entered into Cook Islands society. Policy reports on education were commissioned calling for a range of changes including language and culture instruction. The 1990s saw rapid economic growth, , high rates of Cook Islanders leaving the country, and an increase in non-Cook Islanders entering the country.

#### Relationship between Mārama, Rave, Akarongo and Tamou.

Tamaka Kiriau (Wild hibiscus (au) fibre sandals)

The story (tua) of Rori who is believed to be the first person to make the tamaka kiriau typifies my Mangaian indigenous educational ideas. Rori became an outcast in Mangaia due to his disagreement on an issue between him and one of the tribal chiefs. His knowledge and wisdom provided him with the concept of what is required to scale or to escape into the makatea (ra'ei). So he made the tamaka kiriau to protect his feet from the sharp coral of the makatea that encircled the island. His pursuers were in awe of how this man managed to evade them all the time. Rori's faith (akarongo) in his creation saved his life several times. It eventually came to a time when he decided to teach other warriors through the rave/ raverave anga (act of weaving) and tamou (memorise) for the sake and protection of the people of Mangaia from foreign invaders. This art has been learnt by indigenous learners on some other islands in the Cook Islands.

## Conclusion

The importance of our Mangaian culture is worth preserving for the sake of our children and for future generations to come. It has brought about a sense of cooperation and unity amongst the people of my island. It also empowers the leaders of Mangaia to make the right decisions in leading the people towards better ways of living. They must have the determination to maintain and stay committed to the teaching of our indigenous education.

# References

Buse, J. and Taringa, T. 1995. Cook Island Maori Dictionary, Editors, Biggs, and Moekaa. ANU, Canberra.

www.cookislands-maori-dictionary.org/tag mangaia

follow in your footsteps).

4. As in self- development, Te apii nei i te raverave tapeka kaa (I am learning how to weave the sennit).

Raverave is used to describe the act of doing something.

# Akarongo

The online Mangaia dictionary describes Akarongo in Mangaian as listening to and faith.

- 1. As in discipline, E akarongo koe e eaa ta te puapii e apii maira (Listen to what the teacher is teaching you).
- 2. As in identifying, E akarongo reka koe i nga tu tangi ove e rutu a maira (You have to listen carefully to the different tones of the various wooden drums).
- 3. As in christian values, Na to akarongo koe i ora i koe (Your faith has kept you alive).
- 4. As in praising, Ua riro to akarongo ei pupu akaou mai ia matou i te ngai okotai (Your faith has brought us together again as a family)

## Tamou

Buse and Taringa (1995) defines it as, to remember and to memorise.

- 1. As in concentration, E tamou pakari koe i tei apii ia (You have to remember what was taught today).
- 2. As in advise, Me tamou ngakau koe i taau irava, mama ua iakoe i te tatau mai (If you memorise your Bible verse, it will be easier to say it).
- 3. As in recall of information, Tamou ia toou papaanga (Remember your genealogy)

Tamoumou is a derivative of Tamou which means to continuously practice. For example, te tamoumou nei rai au i te akatangi kita (I am still practicing on how to play the guitar well), as in commitment. Throughout these shifts, Vai'imene contends that the informal Indigenous education instilled by grandparents within their grandchildren through conversations and practices within the home or church was interrupted by the introduction of ICTs such as television

# Cook Islands Education System

Presently, the Cook Islands education system consists of the following 31 education providers: 11 primary schools (10 of which have ECE centers attached), 4 secondary schools, 14 area schools that provide education from ECE through the secondary level on one site and management structure, and a tertiary institute that provides alternate pathways of education. Figure 1 offers a visual of the geographic location of these schools, while Table 2 details the schools in the Cook Islands by region, island, status, and education level. The Cook Islands' structural, geographic, and demographic constraints have an impact on schools, especially the Northern group, since resourcing the islands is costly. Importing goods and providing professional learning opportunities to teachers isolated within the Pa Enua is difficult.

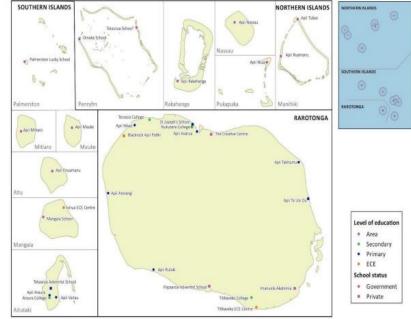


Figure 1: Map of the Cook Islands

Islands are not drawn to scale

In the CKMOE's (2016) Statistics Report, 4,071 students were enrolled in school served by a total of 264 teachers. The following numbers of students show the enrolments in primary education by region: 1,858 nationally, 1,270 on Rarotonga, 429 in the Southern Group, 159 in the Northern Group.

REGION	ISLAND	SCHOOL STATUS	EDUCATION LEVELS
Rarotonga	Rarotonga	Government:      Arorangi School     Avarua School     Nikao Maori School     Rutaki Primary     Takitumu Primary     Takitumu Primary     Trereora College     Cook Islands Tertiary     Institute Private – Church:     Imanuela Akatemia     St Joseph Primary     Nukutere College     Papaaroa SDA School Private – Independent:     Blackrock ECE     T Uki Ou	ECE - Year 8 ECE - Year 8 ECE - Year 8 ECE - Year 6 ECE - Year 6 Year 7 - Year 13 Year 7 - Year 11 Adult Education ECE - Year 13 ECE - Year 6 Year 7 - Year 11 ECE - Year 10 ECE ECE - Year 8
Southern Group	Aitutaki	The Creative Centre Government:     Araura Primary     Vaitau Primary     Araura College Private – Church:	Adult Inclusive Education ECE – Year 6 ECE – Year 6 Year 7 – Year 13
	Mitiaro	- Tekaaroa Adventist School Government:     - Mitiaro School Government:	ECE – Year 6 ECE – Year 11
	Mauke Mangaia	Enuamanu School Government:     Mauke School Government:     Mangaia School	ECE – Year 13 ECE – Year 11 ECE – Year 12
Northern Group	<u>Manihiki</u>	(ECE satellite units at <u>lvirua</u> Government: - Tauhunu School - Tukao School	ECE – Year 11 ECE – Year 11
	Penrhyn Rakahanga	Government: - Omoka School - Tetautua School Government:	ECE - Year 10 ECE – Year 8
	Pukapuka	Government: - Rakhanga School Government: - Niua School	ECE – Year 11 ECE – Year 11
	Nassau Palmerston	- Nita School Government: - Nassau School Government:	ECE - Year 11
	Paimerston	- Lucky School (Island Administration)	ECE – Year 11

#### Table 2

Schools in the Cook Islands - By Region, Island, Status and Education Level

# Mārama

Buse and Taringa (1995) defined mārama as understanding. In Mangaia, it can be termed as levels of understanding. It can also mean light or to provide light. For example: Mei po mai, ki te mārama (from darkness to light). Below are examples of what the learner is telling the tutor at different levels of his understanding.

- 1. As in comprehend, Kua mārama au i taau e tara mai nei (I do understand what you are talking about).
- 2. As in reasonable knowledge, Te mārama rama uatu ra au i toou manako (I have a fair understanding of what you are thinking about).
- 3. As in admiration, Te ngakau parau nei au i toou tu mārama (I have a great respect for your understanding of this issue).
- 4. As in knowledgeable, Te mārama oonu atu ra au e eaa taku ka rave (I have a deep understanding of what has to be done).

The sentence below shows the teacher's appreciation of the students' valued understanding of the matter at hand.

1. As in mutual respect and achievement, Te rekareka nei au e kua mārama koe i te puapinga o teia aku e apii atu nei. (I am happy that you understand the importance of this matter)

Within this context, the value of respect for each other (learner and the teacher) is appreciated.

# **Rave/ Raverave**

Buse and Taringa (1995) identified this as related to the actions and deeds of a person during his/ her lifetime through the eyes of a person, persons, family, community and the people of Mangaia.

- 1. As in decision making, Na roto i taau e rave ra, e kite ei koe i te iki i te meitaki e te kino. (It is through your actions and deeds that you will be able to distinguish the good from the bad.
- 2. As in perseverance, Me naunau koe i te raverave, ka viviki rai koe te kite (If you practice it often, you will learn it quickly).

3. As in role modelling, Me rave koe i te au peu tau, ka aru rai taau tamariki i taau i rave (If you do good deeds, your children will

The arrival of the missionaries shifted the people away from their marae/ kainga (residential outpost) to the coast. Most of the Mangaians were converted to Christianity due to the teachings of these missionaries but some returned to their tu etene (heathen practices). Eventually these non - believers gave up their past beliefs and way of life not because they wanted to. They succumbed to battle fatigue against the converts which were planned and sanctioned by the missionaries. A very cold weather pattern during that time also assisted in their decision to learn this new way of life aided by the lack of warm clothing which was only available from the missionaries.

In Mangaia, a Makona is described as a person 'championing a cause'. For each indigenous learning discipline, be it fishing or navigation, the makona is responsible for pushing the learning of these within a community. However, he is not the expert or taunga of these skills. For example, in lagoon fishing, the expert is the mata- mangaika (eyes of the fish) or ravakai tu (standing up fisherman).

At home, indigenous knowledge is orally passed on from parents and elders to the children. These are usually focused on remembering and knowing their genealogy. The indigenous skills taught in the homes are mainly related to food gathering.

### Indigenous education institutions.

### Are Uipaanga (Meeting House)

Unlike the other islands in the Cook Islands, informal learning is done in the meeting houses of each Puna (districts). The **uapou** (an after church session), **pukuru** (a yearly district meeting) and **takurua mataiti** (yearly feast and sharing of food) are held in or within the surroundings of these meeting houses.

Are Apii Tapati (Sunday School Hall)

These buildings are used for religious studies. However, most of these structures have been used as dancing halls by the people of Mangaia.

The following numbers of students show the enrolments of secondary education by region: 1,685 nationally, 1,201 on Rarotonga, 344 in the Southern Group, and 140 in the Northern Group. Although each classroom varies, the CKMOE (2016) offers the number of teachers and students within each level of education to provide an understanding of the national averages for class size ratios. Within the ECE classrooms typically, 32 teachers serve 528 students, resulting in a 1:17 student to teacher ratio. Within the primary classrooms, 107 teachers serve 1,858 students, resulting in a 1:17 ratio. Lastly, 125 teachers serve 1,685 students in secondary classrooms, resulting in a 1:13 ratio. Approximately 202 students in the Cook Islands receive learning and remedial support from 31 student support aides and 20 school support staff.

All schools have a school committee or PTA, which plays an important role in conjunction with the principal and staff in strategic planning, policy formulation, review and endorsement of policies, and fundraising (CKMOE, 2016).

# **Teacher Workforce**

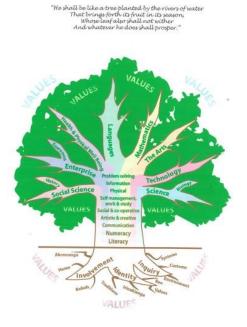
Teachers in the Cook Islands are of Cook Islands descent, part Cook Islands descent, foreign recruits mostly from New Zealand (MFEM, 2015). Teachers can be trained within the Cook Islands or abroad, mostly in New Zealand and Australia. In partnership with the University of the South Pacific (USP), local teachers can work in schools while completing their teaching certificate (CKMOE, 2016). Teachers are required to meet minimum qualifications such as a Bachelor of Education, but they are also encouraged to further their education through postgraduate studies in education, educational leadership, and educational policy and planning. Furthermore, teachers can pursue a Master of Education from USP.

# The Curriculum Framework

In 2002, the Ministry of Education published the Cook Islands Curriculum Framework document that established the policy for learning and assessment in Cook Islands schools. As a framework for developing learning programs, it sets principles for teaching and learning, identifies essential learning areas and skills for students, and

skills for students, and incorporates the values and attitudes of Cook Islands society (CKMOE, 2002). Conceptually, the framework is represented by The Tree of Learning (Figure 3). Chosen as a symbol of the Cook Islands people's interconnectedness to nature, land, spiritual beliefs, and economic well-being, the Tree is firmly rooted in local society. The roots represent the values and attitudes that need to be developed through schooling, beginning at the ECE level. The trunk of the tree represents essential skills, such as literacy and numeracy across the curriculum, which contribute to the knowledge of essential learning. The branches represent the eight essential learning areas that are intended to provide a balanced education. Languages are positioned as the central branch to communicate the importance of language as access to traditional cultural knowledge. From the values of honesty (tuatua tika), integrity (tiratiratū), charity (ngakau öronga) and love ('inangaro) within the soil, to the values inherent in the foliage of the learning areas, the Tree links students to the values in the air outside the country that impact Cook Islands society (CKMOE, 2002). An understanding of change is inherent in the framework and is responded to within the grounding of students in Cook Islands values and beliefs (CKMOE, 2002).

Figure 3. Cook Islands curriculum framework: The tree of learning. From "The Cook Islands Curriculum Framework" by Cook Islands Ministry of Education, 2002, p. 3.



"E tau a i a ki te rakau i tanumia ki te pae kausai ra Ko tei 'ua i tona ra tuatau tikai, e ko tei kore roa i mae tona rau:

ko tana katoa e rave ra, te meitaki ra ia.'



# **Education and Culture**

# Orauamau Paio

## Introduction

I decided to base my assignment solely on the island of Mangaia as it is my home island. Mangaia is the southern- most island of the Cook Islands. To understand the indigenous education of Mangaia, I have to look back at the pre- Christian era where the very survival of all tribes depended on the wisdom of each tribal leader. Should I say, a knowledge imparted or derived from parents to the child. The conversion to Christianity brought about a new or foreign type of indigenous learning. The main concern today is as more Mangaians decide to leave the island, the less of us left to pass on this knowledge.

There are three main villages namely Oneroa, Tamarua and Ivirua. The isolation of these settlements meant that the people of each village spoke their own dialect. There are some words used that are completely spelt differently but has the same meaning. For example, to chase after another person. In Oneroa, the term used is tuaru, in Ivirua, tuerua and in Tamarua, nenga or nengaia.

Therefore, I have selected the words (kupu), mārama, rave, akarongo and tamou as these are commonly used and understood by Mangaians.

# Indigenous Education

Before Christianity, a tribal chief seeks divine guidance from the pia atua (heathen gods) of his tribe. The message is then relayed throughout the tribe (Ngati). They depended on their gods for the direction of what they have to learn in order to survive. Mautara, a great Ngati Vara tribal leader, managed to keep the peace in Mangaia for a long time by constantly 'talking' to the pia atua.

Brayboy, B. M., & Maughan, E. (2009). Indigenous knowledges and the story of the bean. Harvard Educational Review, 79(1), 1-21.

Bhabha, H. K. (1994). The location of culture. New York: Routledge.

Bogdan, R. C., & Biklen, S. K. (2007). Qualitative research for education: An introduction to theories and methods (5th ed.). Boston: Allyn and Bacon.

Boshier, R. (2015). Learning from the moa: The challenge of Maori language revitalization in Aotearoa/New Zealand. In W. J. Jacob, S. Y. Cheng, & M. K. Porter (Eds.), Indigenous education (pp. 1-35). Dordrecht: Springer Science+Business Media.

Bowers, C.A. (2008). Why a critical pedagogy of place is an oxymoron. Environmental Education Research, 14(3), 325-335.

Buckner, E., & Kim, P. (2014). Integrating technology and pedagogy for inquiry-based learning: The Stanford mobile inquiry-based learning environment (SMILE). Prospects, 44, 99-118.

Clothey, R. A. (2015). ICT and indigenous education: Emerging challenges and potential solutions. In W. J. Jacob, S. Y. Cheng, & M. K. Porter (Eds.), Indigenous education (pp. 1-35). Dordrecht: Springer Science+Business Media. Upheld by the following principles, the Cook Islands Curriculum:

- Fosters achievement and success for all learners.
- Reflects the unique nature of the Cook Islands including cultural and spiritual beliefs and values.
- Recognizes the primary importance of language in the delivery of the curriculum. It promotes the use of an effective bilingual ap proach.
- Encourages students to be life-long learners and to take responsibil ity for their own learning.
- Promotes relevant, meaningful, and useful learning. It emphasizes the need for students to have a broad and balanced education.
- Provides for a coherent progression of learning and enables that progress to be measured against clearly defined achievement object tives.
- Provides the flexibility to meet the needs of individual students, lo cal conditions, and change.
- Recognizes the importance of an integrated approach to learning.
- Provides equity of educational opportunity, recognizing that stu dents have different ways of learning and learn different things at different rates.
- Recognizes the Cook Islands' place in the wider world including its special relationship with New Zealand and its role in the Pacific. (CKMOE, 2002, p. 5-7)

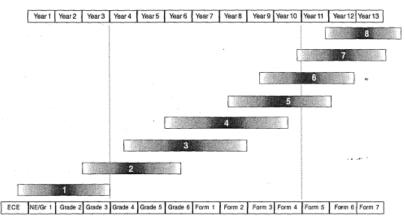


Figure 4. Levels of achievement, class and year bands. From "The Cook Islands Curriculum Framework" by Cook All learning area curriculum statements are aligned to the Levels of Achievement, Class and Year Bands (Figure 4). There are eight levels of achievement that assist teachers in assessing students' individual progression throughout their years of schools. These achievement levels recognize that individual students work at a range of levels and rates. Students are offered 13 years of school, beginning at the age of 5. Prior to age 5 students are enrolled in ECE centers to prepare for schooling. In Figure 4, underneath the labeled years of school, are the eight levels of achievement. To align with the New Zealand qualifications and achievement levels, Year 7-13 is also identified as Form 1-7. It is expected that by the end of Form 4, students are achieving at Level 5. The curriculum statements for Levels 6-8 are closely aligned to New Zealand's qualifications to allow for these assessments to be available for Cook Islands students.

Within the Learning for Life Cook Islands Education Master Plan 2008-2023 (EMP), a guiding vision for education speaks to Vai'imene's concerns regarding the consequences of development upon the future of Indigenous Cook Islands language and culture (CKMOE, 2008). Grounded in the Education Sector Policy Framework, the goals of the National Sustainable Development Plan (NSDP), the Cook Islands Millennium Development Plan, and the recommendations of the Education Sector Reviews, the EMP focuses on learning for life for all people within the Cook Islands. To introduce the EMP, John J. Herrmann, then Secretary of Education, offered the following:

Strength in language, culture and nationhood will enable our people to face the challenges of a world that is forever changing. This plan recognizes the wealth of knowledge, skills and expertise prevalent at both the local and global level and the utmost importance of the need to work collaboratively and collectively in partnerships at various levels. ... The challenge for all those involved in the implementation of this plan will be to listen to each other and the wider community, to be responsive to what they hear and to focus on the outcomes for the many learners this plan is designed to support. (CKMOE, 2008, p. 2).

Recognizing these challenges and the need to build upon existing initiatives, the EMP offers four areas of strategic focus for Cook Islands education over the next 15 years: Taku Ipukarea Kia Rangatira, Learning and Teaching, Learning and the Community, and Infrastructure and Support. Albirini, A. (2006). Cultural perceptions: The missing element in the implementation of ICT in developing countries [Online]. International Journal of Education and Development using ICT, 2(1). Retrieved from http:// www.ijedict.dec.uwi.edu/viewarticle.php?id=146.

An, Y., & Reigeluth, C. (2012). Creating technology-enhanced learnercentered classrooms: K-12 teachers' beliefs, perceptions, barriers, and support needs. Journal of Digital Learning in Teacher Education, 28(2), 54-62.

Ananiadou, K., & Claro, M. (2009). 21st century skills and competences for new millennium learners in OECD countries. OECD Education Working Papers, No. 41. Paris, France: OECD Publishing.

Araya, D. (2012). Internet. In H. Anheier, & M. Juergensmeyer (Eds.), Encyclopedia of global studies (pp. 950-955). Thousand Oaks, CA: SAGE Publications, Inc. doi: http://

dx.doi.org.libproxy.usc.edu/10.4135/9781452218557.n300

Au, K. H. (1998). Social constructivism and the school literacy learning of students with diverse backgrounds. Journal of Literacy Research, 30(2), 297-319.

Bala, P. (2011) Re-thinking methodology through the e-Bario Project: From participatory methods to a relational approach to ICT for rural development in Sarawak, East Malaysia. In J. Steyn, J. van Belle, & E. V. Mansilla, (Eds.), ICTs for global development and sustainability: Practice and applications (pp.1-18). Hershey, PA: Information Science Reference.

Bang, M., & Medin, D. (2010). Cultural processes in science education: Supporting the navigation of multiple epistemologies. Science Education, 94, 1008-1026.

Battiste, M., & Henderson, J. Y. (2009). Naturalizing indigenous knowledge in Eurocentric education. Canadian Journal of Native Education, 32(1), 5-18.

Bensimon, E. (2004). The diversity scorecard: a learning approach to institutional change. Change, Jan/Feb, 44-52.

Brantley-Dias, L., & Ertmer, P. (2013). Goldilocks and TPACK: Is the construct "just right"? Journal of Research on Technology in Education, 46(2), 103-128.

## References

Afamasaga, G.T., 2007, Education in a Pacific Context: Enhancing Ownership of the Processes of Education, *31st Annual Conference of the Pacific Circle Consortium,* Honolulu, Hawai'i

Bacchus, M., 1997, Education for development and social justice in the third world. In T.

J. Scrase (Ed.), *Social justice and third world education*, New York: Garland Publishing.

Beumelburg, Paul David, 2016, *Apiianga no te oraanga akapuapinga e te taporoporo i te ipukarea : Education as Sustainable Development: Mangaia, Cook Islands*, PhD thesis, Massey University

Connell, John, 2005, A Nation in Decline? Migration and Emigration from the Cook Islands, in *Asian and Pacific Migration Journal*, Vol. 14, No. 3

Cook Islands Ministry of Education, 2016, *Ministry of Education Statistics Report: 2016*, Rarotonga: Government of the Cook Islands.

Karabel, J., & Halsey (eds.), 1977, *Power and ideology in education*. New York: Oxford University Press

Ministry of Education, Cook Islands, 2008, *Education For All – the Cook Islands Education Master Plan 2008 – 2023*, Rarotonga, Government of the Cook Islands

Penetito, W, 2009, Place-Based Education: Catering for Curriculum, Culture and Community, *New Zealand Annual Review of Education*, 18, 5-29.

Schultz, T., 1961, Investment in human capital, *The American Economic Review*, *51*(1), 1-17

Smith, G., 2002, Place-based education, Phi Delta Kappan, 83(8), 584

Te au Puna o Mangaia, 2014, *Ta'i Ake Puku Kana e Kai ei te Atea: Mangaia Island and Puna Plans 2014 - 2018*. Mangaia: USP

Rist, G. (2002). The history of development. London: Zed Books.

Vaiimene, G., 2011, Survey of the whereabouts of ex-students of Mangaia School, Mangaia.

Taku Ipukarea Kia Rangatira focuses on strengthening Maori language and culture to ground a learner's identity as a Cook Islander, and thus better prepare him/her for engaging with the world (CKMOE, 2008). The second focus of the EMP is Learning and Teaching, which offers equitable access to all learners through a range of quality programs to meet individual needs and talents. Learning and the Community focuses on increasing the participation of parents and community members in determining quality educational outcomes. Finally, Infrastructure and Support focuses on appropriate legislation, research, guidelines, and standards to support and enhance learning opportunities.

In 2015, the CKMOE published the Statement of Intent that outlines the priorities for the next 5 years based on the current position of education in the Cook Islands. The first priority focuses on functional literacy (Maori and English) and numeracy outcomes as foundational support for access to other learning areas. The second priority identifies teacher quality as essential to increasing student achievement. The third priority focuses on learning environments being student centered, resourced, and physically sound. The fourth priority focuses on building a quality tertiary education sector. The fifth priority focuses on sector management to respond to development within the changing environment, as well as inciting innovation in learning.

These priorities are connected to external organizations that have established relationships with the Cook Islands. In particular, the United Nations Educational, Scientific and Cultural Organization (UNESCO) focuses on holistic policies that can address the new thinking necessary for sustainable development in the face of uncertainty, instability, and connectivity in our globalized world. Small Island Developing States (SIDS) are a focus for UNESCO's World Heritage program. Although SIDS have proven to thrive in challenging times, the multiple and varied problems that these communities face are of particular concern to UNESCO (2016). Within Cook Islands education, UNESCO has worked to provide basic education for all, improved quality of teaching, and vocational training (CKMOE, 2015). UNESCO's influence as well as the New Zealand Ministry of Education's influence are apparent within the priority outcomes of the Cook Islands Ministry of Education. Evidence of success for the first and second priority are directly linked to the New Zealand Qualification Authority's (NZQA) system of National Certificate of Achievement (NCEA). NCEA is a standards-based qualification in which students gain credits by providing evidence of their performance in criteria of a learning area/discipline (CKMOE, 2016). Evidence is provided through external examination or internal assessment of students throughout the school year with awards of merit or excellence resulting in qualification or credits. As evidence of functional literacy and improved teacher quality outcomes, the Cook Islands priorities identify an increase in NCEA literacy and numeracy outcomes, as well as an increase in students enrolled in NCEA courses. Furthermore, UNESCO's education for all focuses on basic skills as the foundation for learning.

The initiative of increasing vocational programs on Mangaia will be a transition for teachers and students as they learn to navigate the resources on hand, the learning of the Indigenous students that they serve, and the materialization of their values and beliefs within their practice.



What is less clear from the literature is how convincing these arguments will be to Mangaian parents and their children who, as Vaiimene records, are currently heavily invested in the academic curriculum and outmigration. There is a growing acceptance among the community of a curriculum that is less academic and more technically and vocationally skillbased (Te au Puna o Mangaia, 2014). The school is currently engaged in allocating increasing classroom time to skill-based technical education. My action-based research will focus on documenting these change and recording their reception in the community, and their outcomes in terms of student achievement, particularly among boys. This will be coupled with action to change school and community thinking towards whole-of-island responsibility for high schools graduates and drop outs, through the provision of on-island tertiary training opportunities, apprenticeships and onisland employment opportunities. My research will again focus on documenting these initiatives and recording their effectiveness in stemming out-migration.

#### 6.0 Conclusion

Penetito states the importance of place based education to indigenous people where the content of what should be taught in schools is based on the environment they are living within. This means that the curriculum should not be developed for a foreign context but rather focussed on "place". In reality the western education system/curriculum is driving many of our indigenous people out of their own environments through migration to pursue foreign goals and objectives instead of meeting local aspirations, goals and objectives. This is causing many small island countries like Mangaia to lose their youthful population overseas. Losing our students overseas is not creating a sustainable living environment for our indigenous people. It's important that education stakeholders relook and revisit our current curriculum system to ensure that students learning are directed at the environment and culture embedded in the community. As Penetito claims, the New Zealand education system is not providing adequate structured opportunities for all indigenous people to aspire to. It is unfortunate that our indigenous people are well wrapped up in this foreign education system and many are being led to believe that this is the only pathway to learning.

The Cook Islands' Ministry of Education worked with local orators and teachers to determine what should be assessed at each level in the Cook Islands' tradition and culture learning area, and then consulted with local teachers for endorsement. This took time to be completed and provided a whole new learning experience for local stakeholders. It also demonstrated that local expertise was capable of formulating contextualized content which shows our ability to manage what needs to be taught at this level. Without doubt, this policy supports the idea of place-based education noted by Penetito (2009) and Smith (2002) and permits children in the Cook Islands to learn about their own culture and environment. Although this has taken many years to be acknowledged, it is nevertheless pleasing to see small shifts taking place.

But this additionally raises questions as to who decides what is to be taught in schools in the Cook Islands. This is critical as currently 100% of the course work for NCEA L1, 2 and 3 is determined by NZQA and only the Cook Islands Maori subject is given the privilege of Cook Island teachers deciding what is to be taught. A place- based approach suggests there is a need to reverse this system so that Cook Islanders can decide what needs to be taught to their own children and what Mangaians choose is best for their children. Although the changes described for Cook Islands language teaching represent a small change towards place-based education, a more thorough revamp of the system may be required to ensure our children learn about and value their home environment and context first.

The literature on "place based education" and "education for sustainable development" are important in validating calls for greater local control of education curriculum and educational outcomes. The emphasis on locating success in the local rather than externally in New Zealand provides a possible way towards stemming out-migration. Gegeo and Watson-Gegeo's arguments that knowledge creation and critical thinking skills honed in the local contexts can be equally applicable to understanding and finding opportunities in the modern world are reassuring against arguments that place-based education disadvantages students in their subsequent encounters with the wider world.

# 2.0 The Study

Mangaia Island is faced with a serious migration issue and there is an urgent need to look at systems that can minimise the impact of this continuous trend. One of that system is looking at the education curriculum and see how this can improve the current issue of migration on the island. I am interested in discovering what the appropriate curriculum is for students studying on small island population (Mangaia) with a continuous trend of migration and population instability. For many years now, when our students complete their formal secondary education (NCEA Year 12) they are destined to travel overseas for employment opportunities. We have had limited number of students continuing their education at the tertiary level where the majority is eveing for the workforce. This has been a burden for me as a teacher of the school in reversing this trend through offering a more appropriate curriculum that will encourage our students to remain and be self-reliant on the island. With this continuous trend of migration especially for school leavers, we are destined to struggle in our local economy and infrastructure.

# 2.1 Purpose of Research (Rationale)

The majority of Mangaian students are not succeeding with the current academic curriculum, particularly young men. The meetings identified the need for a more appropriate school curriculum that addresses the island's current development needs and encourages retention of, in particular, young males to beyond compulsory school leaving age (with training in carpentry, plumbing, tiling, mechanics, agriculture, horticulture, fishing and marketing, ICT, etc) and prepares young Mangaians for local employment in home production (jewellery, carving, the arts), as builders or mechanics, or fish and food and craft producers for the local market. A change from the current academic curriculum to a predominantly vocational curriculum, with adequate on-island training and employment for school leavers. This I believe will retain our students on the island to help improve the infrastructure and economy of the island. Vaiimene (2011), a teacher at Mangaia School, in her unpublished research recorded the current whereabouts of 127 ex-students from Year 6 upwards, enrolled at Mangaia School in 2003. The figures illustrate that only a very small number remain:

- 21 are still in Mangaia;
- 3 do seasonal work in New Zealand at the freezing works and return to Mangaia for the other 6 months of the year;
- 45 live elsewhere in the Cook Islands (43 in Rarotonga, 1 in Pukapuka and 1 in Aitutaki); and 58 are overseas (31 in New Zealand and 27 in Australia).

Clearly, the pattern has been migration away from Mangaia with 81% of students leaving Mangaia for Rarotonga, New Zealand or Australia. Migration is an acceptable livelihood strategy on Mangaia and drives stakeholder desire for a western education. Most students do not currently foresee a future on Mangaia though many expressed a desire to return one day. Six of the Y12 students and a similar number of Y11 students declared that once they made some money they would like to return.

The survey clearly supports the findings of Connell 2005 indicating a serious decline in the Cook Islands population. For Mangaia, the trend is alarming. The data in Gills findings indicates that a large proportion is seeking employment and further tertiary studies overseas. A whole sector approach to education delivery on Mangaia is required to immediately to ensure that our children, our people are retained on the island. A thorough review must be taken at addressing the Puna Plan of the island to ensure that stakeholders both in the non -government and government organizations need to link agendas and programs together that will recompense the notion of placed based education targeting at increasing vocational and on island training programs to retain our population and grow our economy.

This research is important to me to ensure there is sustainable education system for our children. If we do not address this issue now, more of our children iare destined to meet the need of western education.

country. He quotes Rist (2002) on how knowledge of western science, business, commerce and technology (key components of western education) are considered to be the gateway to economic success. This is reinforced by Bacchus, (1997); Karabel & Halsey (1977) and Schultz, (1961) who argue that western education directs student aspirations towards western ideologies, values, beliefs and lifestyles. His research adopts a case study approach to rethinking education on Mangaia by exploring the need for a 'culturally responsive' education. He argues for education that reflects Mangaian concepts of sustainable development - an eclectic mix of traditional livelihoods, culture and alternative modernities. Beumelburg proposes possible components of a place-based Mangaian curriculum and pedagogy. These elements would provide students with the skills, knowledge, deep understanding and action competence required to explore the complexity, diversity and dynamic nature of sustainable development on Mangaia and to engage with the outside world. Proposed components for a sustainable education development for Mangaia by Beumelburg include the following –

- knowledge of Mangaian values and culture
- knowledge of western ideology and technology
- knowledge of economics and business
- Knowledge of vocations
- knowledge of the Mangaian environment
- knowledge of Mangaian society

His findings emphasizes the importance of a culturally responsive education based on local values, beliefs, practices and ideologies. Western forms of education do not encourage individuals to value their culture and place but rather act to detach individuals from their culture and place of belonging. Beumelburg's proposed education model for Mangaia echoes notions in Penetito 2009 of "placed-based education".

- In 2013, the New Zealand Qualifications Authority published new unit standards for the Pacific Studies Cook Islands Tradition and Culture Domain. The Cook Islands' Ministry of Education made a case to NZQA National Qualifications Services (NQS) to develop standards that could be used to assess outcomes from its Cook Islands Maori Curriculum (Secondary Levels 6-8). This resulted in an agreement between the Cook Islands' Ministry of Education and the New Zealand Qualifications Authority (NZQA) to develop these standards. achievement but more importantly it helps overcome the alienation and isolation of individuals which have become, for many, the hallmarks of modern education. By having that real life experience with their environment it creates a sense of importance and value of its culture and environment among students. Smith claims that when learning is embedded at the grass roots of the community, students will take ownership and demonstrate loyalty and commitment to their own communities and culture. It is this sense of belonging that encourages students to remain in the same place and environment. The current education curriculum does not embed this sense of belonging but rather imposes the idea of western society as the location of success.

But does place-based learning provide the skills required for student engagement as adults with the modern western world? Gegeo and Watson-Gegeo (2002) argue that for children to have the opportunity to succeed in both the village and the outside world, the education system must be 'de-hegemonized' and begin to address not just physical and economics needs (the primary goals of 'development') but personal growth and well being – a more holistic approach to 'development'. Through a village based Genealogy Project, Gegeo and Watson- Gegeo describe how villagers learned that indigenous ways of knowing and critiquing are equally effective in solving modern as well as 'traditional' problems and issues.

They are also equally valid as an alternative ways of reasoning towards valid conclusions. A critical task for the 'place-based education' approach they advocate, is the validation of local ways of thinking and knowing, revaluing their role in contemporary life as alternative and equally valid pathways to knowledge and knowledge creation, using reasoning and critical thinking skills, identifying business possibilities, and so on. Gegeo and Watson-Gegeo argue that indigenous critical thinking processes among Kwara'ae villagers involve dialogic thinking, critical discussion, semantic debate and development, interrogation, incorporative interaction, etc, all of which are as effective as western approaches to understanding and finding opportunities in the modern world.

Beumelburg (2016) in his research on education for sustainable development on Mangaia, addresses the ever-dominant western education paradigm in the Pacific, in which education is seen as a tool to build human capacity as an investment necessary for the economic development of a



# **Literature Review**

What is an appropriate curriculum (vocational/ academic) for students on Mangaia that will meetthe needs of the island?

# Michael Papatua

Connell (2005) examines the issue of migration in the Cook Islands resulting from economic restructuring in the mid-1990s. He records high levels of migration across all islands in the Cook Islands, with skilled workers including doctors, nurses and teachers leaving the country. In 1971 the population in the Cook Islands had reached a peak of 21,323 but by 2001 it had fallen to 18,027 and was continuing to decline. For Mangaia, in particular, population in 1991 was 1214 but by 2001 had fallen to 744 and was continuing to fall. Connell notes that, overall, the population of the Cook Islands was falling faster than any time in recent history. This has given the nation an aging population and relatively high dependency ratios. The impact of this massive depopulation has created some concern that education standards in the outer islands have actually fallen with migration impacting on teaching. For example, more composite classes have been established and retired teachers encouraged back into the work force with financial incentives created to lure people to go back to the outer islands to work. Connell's conclusion is that since Cook Islanders have a growing expectation of New Zealand standards of living, unrestricted access to New Zealand, and an education system oriented to the New Zealand workforce, it will continue to struggle to sustain its own people in the Cook Islands. His finding is confirmed for Mangaia by a local study of 127 ex-students from Year 6 upwards, enrolled at Mangaia School in 2003 Vaiimene (2011). Vaiimene confirms that the majority of Mangaian school students currently go on to employment and tertiary studies in New Zealand and Australia. Clearly, for the majority of Mangaian school children and young adults, migration is an acceptable livelihood strategy which, according to Vaiimene, drives stakeholder's desire for a western education.

This raises a dilemma common to many Pacific islands –the idea that success happens offshore has been actively built into the education curriculum, and has been so successful that it now threatens population sustainability in many islands.

This raises a number of question concerning who determines the curriculum, its content and its expected outcomes. Do educators provide children with the skills for migration or the skills to create a future on their island? Is this an either/or question, or can both goals be encompassed within the school curriculum?

The Cook Islands Ministry of Education Statistics Report 2016 clearly articulates the current focus of the Ministry of Education and the forms of education being delivered in the Cook Islands. It is academic-dominated and the data collected by the Ministry and reported to stakeholders, reflects this preoccupation. It also reflects the Ministry's pre-occupation with a content-based curriculum and confirms that our children are struggling to meet the standards set by this curriculum. The numbers of students under-achieving within this form of education, according to the data presented in this Ministry Report, is alarming.

This raises a further question, as to why local island communities subscribe to a predominantly academic education curriculum that excludes or 'fails' the majority of community members in an effort to identify the future administrative, political and economic elite, under the Ministry's vision statement of "Education for all."

Afamasaga (2007) addresses the issue of lack of ownership of the formal education system by Pacific Islands peoples and the absence of vision linking education to island development. She notes the current utilitarian emphasis on education for economic development and questions whether this serves the needs of island nations. She argues that schools should relate to local communities expectations of what schools are supposed to do but instead are aspiring to international curricula and standards, often set by overseas experts. She quotes Thaman on the need for Pacific communities to identify for themselves the student behavior and performances that they would like schools to produce while re-focusing on student outcomes rather than on subject objectives. Such student outcomes might include fluency in English and the home language, ability to work co-operatively to achieve collective goals, analytic ability, problem solving skills, health awareness and facility in indigenous protocol and etiquette. Core to this all is the revaluation of Pacific indigenous knowledges and epistemologies or ways of knowing as well as indigenous ways of assessing and evaluating.

Penetito (2009) emphasizes the importance of such place-based education to indigenous people where the content of what should be taught in schools is based on the environment they are living within. This means that the curriculum should not be developed for a foreign context but rather focussed on "place". In reality the western education system/ curriculum is driving many of our indigenous people out of their own environments through migration to pursue foreign goals and objectives instead of meeting local aspirations, goals and objectives. Penetito quotes the Appalachian Rural Education Network as an example of a community providing the context for learning, students work focusing on community needs and interests, and community members serving as resources and partners in every aspect of teaching and learning and their outcomes. This idea of the local community and the school taking joint responsibility for students graduating from the education system is a key idea for Mangaia that is discussed further below.

Smith (2002) outlines five important components of 'place based education.' These include cultural studies, nature studies, real-world problem solving, internships and entrepreneurial opportunities and induction into community processes. He emphasizes that the strength of place based education allow teachers and students to relate to happenings around them, using that basic knowledge to examine and evaluate more distant and abstract knowledge from other places. It is also involve students becoming knowledge creators rather than consumers of knowledge created by others. by others. Student ownership and engagement with their own learning is encouraged when they are given the chance to participate in the creation of their own learning agendas. Teachers in such settings act as co-learners in helping students acquire the skills they need. Furthermore the wall between the school and the community becomes more permeable where community members can take active roles in the classroom and students can play an active role in the community. His view of place-based education emphasizes the way in which it serves to strengthen children's connections to others and to the regions in which they live. It enhances