Te Whanake and Te Aka digital resources

John C. Moorfield

Introduction

Since 1985, the primary focus of the author's research and writing has been on developing the Te Whanake collection of textbooks, study guides, teachers' manuals, audio resources and, a dictionary. More recently, digital resources have also contributed to the collective effort towards Māori language revitalisation nationally, with the intention that Māori remains a vibrant language used in a wide variety of contexts. In the last twelve years, the print texts of the Te Whanake series have been complemented by a range of digital resources. Part of this development has been the desire to make learning te reo Māori more accessible and less expensive through the use of modern technology.

This case study will describe these digital resources, focusing on the process of their development. It will discuss the advantages of these types of resources, which include the Te Whanake Animations, Te Whanake Podcasts, Te Whanake TV and Tōku Reo websites. It will also discuss the nature and development of the popular Te Aka Māori-English, English-Māori Dictionary online. All of these websites are free and accessed from http://www.tewhanake.maori.nz

As well as these websites, the Te Whanake and Te Reo Māori apps for Apple and Google devices will be described, with the reasons for their development. The Te Whanake apps provide a very structured course making maximum use of the range of rich resources available in the Te Whanake suite of websites. These apps also have direct access to the Te Aka online dictionary. The added advantage of the Te Reo Māori dictionary app for increased mobility will also be highlighted. Recent research by Te Ipukarea, the National Māori Language Institute, has delved into how users are benefitting from these resources. Information gleaned from this research will be included.

Te Whanake Resources website

This website was developed to enable people overseas, as well as locally, to buy the Te Whanake resources. It also describes what each hard copy resource contains. Readers who are not familiar with these Māori language learning resources should view this website.

Te Whanake Podcasts website

Developed in 2008, this website was to enable students to use the listening and speaking exercises of the four Te Whanake textbooks, tapes and CDs online. They can also be downloaded to iTunes on Microsoft Windows and Apple computers for use on television screens and portable media devices such as mp3 players, iPods, iPhones and other smart phones, iPads and tablets.

Adapting the taped audio and video exercises and activities for online use has other benefits for not only the learners, but also the staff and institutions involved in delivering

the teaching, e.g.,

- Learners can access all the exercises and activities online at no cost, thus avoiding the expense of purchasing audio and videotapes or CDs and DVDs.
- Learners can record their responses on their computer with an Internet connection. They are also able to submit their exercises for assessment by their teachers who can mark and give quick feedback to their students. All this can be done from anywhere in the world.
- This development meant that language laboratories were no longer required for teaching and learning Māori, thus freeing institutions from a major expense.

The Te Whanake Podcasts website was developed by AUT University staff and students in collaboration with VO2 Digital Design the developers of all the Te Whanake websites.

Te Whanake Animations website
This contains animated movies for all four levels of Te Whanake from Te Kākano to Te Kōhure. Each of the four levels has between 10 and 15 animated movies tied closely to the content of the chapters in the textbooks. Complementing each animated movie are up to 16 exercises giving practice in the new language material introduced in the particular animated movie or in the corresponding chapter of the relevant textbook. This website is designed for independent learning and complements the textbooks of the Te Whanake series.

The Te Kākano Animations began in 2005, while the author and colleagues were at the University of Otago. A substantial grant from e-Learning Collaborative Development Fund enabled teams from Te Tumu and Computer Services at Otago to complete the animations and exercises for Te Kākano. The funding for the completion of the other three stages, Te Pihinga, Te Māhuri and Te Kōhure was from the AUT Foundation and with Capex grants from AUT University. Because animated movies are quite expensive to produce, it took some time to obtain sufficient funding to produce these animated movies. Consequently, this project was not completed until 2016.

Te Whanake TV website
This website of streamed videos consists of two series of TV Māori language programmes for listening comprehension exercises produced in the mid- 1990s. As a result of a partnership between TVNZ Education Television (eTV) a colloquial Māori language course, called Te Kai a Te Rangatira, was designed to complement the Te Pihinga textbook and resources. This first, took the two courses based on these materials into homes and institutions throughout the country in the second semester of 1995. These courses were aimed at people throughout Aotearoa/New Zealand unable to attend regular classes, because of their remote location, family ties or work commitments, and who, under normal circumstances, would not have access to learning the language or the chance to improve

their Māori language skills.

Te Kai a Te Rangatira was the first Māori language television series created as part of a tertiary level language course and screened on eTV. The project was an initiative for Māori Language Year by both The University of Waikato and TVNZ. The production funding support of $1 million came from Te Māngai Pāho and the Ministry of Education. Support in the planning of the venture also came from a variety of people and organisations including Te Taura Whiri i te Reo Māori, Longman Paul (now Pearson), Kōtuku Productions, Te Reo Television, Te Māngai Pāho, and the Ministry of Education.

Each programme in the 13-part television series includes a 12-minute drama based in a city restaurant run by the whānau that own the restaurant land as a result of a land claim. Each episode also includes archive or documentary illustration of the course's main themes. Students enrolled in the courses were permitted to videotape the televised programmes.

Five Māori speakers wrote the drama scripts with former Māori Language Commissioner, Sir Tīmoti Kāretu, and the author of the series as language advisers. The emphasis is on modern colloquial Māori. The story centres on themes that come from the textbook.

However, experience of using the Te Kai a Te Rangatira videos with classes has shown that they are more suited to the Te Whanake 3 Te Māhuri level learners. It was recommended these video programmes, along with the exercises designed for them, be used at the Te Māhuri level.

As a result of the success of this venture, a similar television series for beginners called Te Kākano was completed for broadcast in mid-1997. Each 30-minute programme contained a 12-minute drama series, explanations of grammar and usage points, and discussions about cultural aspects. All of these are related closely to content in each chapter of Te Whanake 1 Te Kākano. Learners will benefit most from the 12-minute drama series if their use is delayed until well into the Te Whanake 1 Te Kākano course. In addition, there are exercises on the website for each episode of both TV series to ensure that learners develop listening skills and are guided into extracting as much benefit as possible from viewing and hearing the language of each episode. Both of these are also available free on this website.

Tōku Reo website

Tōku Reo is a series of half-hour programmes developed and produced by Kura Productions. They complement Te Whanake 1 Te Kākano, the beginner Māori language textbook. There are 300 episodes. Learners of Māori are able to view these episodes online from the Te Whanake website, at http://www.tokureo.maori.nz/ or from Māori Television on demand. Every so often people email me to express their appreciation for the Te Whanake websites and the Te Aka dictionary website. The following email was sent this year by someone who uses the Tōku Reo programmes:

I am watching Toku Reo on demand--I'm on lesson 55 in series one and I wanted to let you know how much I'm enjoying your course. I came to Whangarei about ten years ago from the States and tried to learn Maori as soon as I arrived using a set of tapes. I found it difficult.
Your course is so well set out and well executed down to the presenters wearing new outfits each day, it has opened a new world for me.
My PhD is in Adult Education.
Your work is appreciated.
All the best,
Rita Shelley

Te Aka Māori-English, English-Māori Dictionary website

Print and online dictionaries are important tools for both second language learners and fluent speakers of a language. Dictionaries clarify meanings, parts of speech, usage, spelling, macrons, diacritics, etc. For learners, dictionaries help them learn new words, enabling them to express themselves more clearly and improve their comprehension of the language. Some advantages of online dictionaries are that:

- A printed dictionary is restricted in size and entries are often small and dense on the page. There is less restriction on size for online dictionaries and therefore can be presented in a more readable and attractive format, using colour and space. Online dictionaries have the potential to contain all information a user may need such as usage notes, example sentences, illustrations, audio and video clips. This facility is especially useful in helping identify plant and animal species or entries where a description is inadequate.
- The mobility and convenience of an online dictionary is one of its major advantages.
- An online dictionary can be continuously and easily updated, not delayed by publication dates.
- An online dictionary can be an aid to pronunciation with the inclusion of audio files.
- With a bilingual interface, it is much quicker to find a meaning for a word or the equivalent in the other language. Search engines are usually much faster than manually searching a hard copy print dictionary. They can even accommodate misspellings and diacritics, such as macrons.
- Photographs of important people help with identification. Even recordings of people renowned for their oratory, or the sounds of traditional musical instruments, can be included.
- Production costs are less and distribution is much easier, inexpensive and faster.
- No disc space is required to store the online dictionary on your computer.
- Producers of an online dictionary can have multiple authors working on the

administration site.

- Users can determine the kind of data and indicate what is missing from the online dictionary, e.g., the Te Aka administration website has a feature that lists data about recent unsuccessful searches.
- With online dictionaries, cross-referencing can be done, linking to other entries very quickly and easily.
- Google analytics provides valuable information about usage, while online surveys for research can be conducted quite easily on the website.
- Being free, the online dictionary has a major advantage for users over the cost of a hard copy dictionary (Te Ipukarea, 2016, p. 23).

After the second edition of the Te Aka Māori-English, English-Māori Dictionary was published in 2005, it was decided that it would benefit Māori language learners and increase accessibility if the dictionary was also available free online. After Te Aka went live in December 2006, the author continued to add new entries, to expand existing ones, including subentries for separate meanings and parts of speech. In the last five years, he has also added example sentences, with English translations, for each subentry. The dictionary now has 22,800 headwords, each having a number of subentries. The dictionary has more than doubled the number of entries that it contained in 2011.

Te Aka comprises selected modern and everyday language useful for those learning te reo Māori. It is broader than the traditional Māori dictionary, as Te Aka also includes: encyclopaedic entries, explanations of key concepts central to Māori culture, explanations for grammatical items, idioms and colloquialisms, photographs, audio recordings for pronunciation and to help identify the sounds of fauna, example sentences in Māori from quality Māori language texts and sources for most entries, together with translations. These are all important in helping learners communicate in a Māori language context.

The example sentences contribute to the understanding of how to use a particular word appropriately. Finding suitable example sentences has been greatly assisted by the availability of quality online texts in Māori. These include Te Taura Whiri's corpus of online texts, called Te Mātāpuna, the online versions of the five volumes of Ngā Tāngata Taumata Rau, the Māori language newspapers at http://www.nzdl.org/ and https://paperspast.natlib. govt.nz. Other online dictionaries have also been valuable, including Paekupu, Te Papakupu o Te Marautanga o Aotearoa at http://paekupu.co.nz/ and the Microsoft Language Portal at www.microsoft.com/. Te Aka builds on the dictionaries already available, including specialised dictionaries.

Not only is Te Aka a collection of Māori words and their meanings; it also contains information useful for learners and speakers of the language to enable more effective communication in both oral and written forms of the language. Te Aka has been designed as a free resource that helps any learner become more fluent and literate in te reo Māori. This dictionary continues to be developed. Recording of each headword, using the voices of Te Wharehuia Milroy and Te Haumihiata Mason was completed, for 18,000 headwords, in

2015. The interface has also been adapted for smaller devices, such as iPhones, iPads, iPods Touches, Android smart phones, and tablets.

Google Analytics tells us that each year the number of visits to the online dictionary has increased by about a third. For the year ending on 13 July 2017 there had been 4,790,234 visits to the dictionary, a 33.11% increase on the previous year. The number of unique users during the year was 1,859,189, an increase of 29.17% on the previous year. While 82.57% of visits to the website were from Aotearoa/New Zealand, there were visits from most countries of the world, with Australia having the next largest number at 8.66% of the total.

Te Whanake apps

The Te Whanake app is a container app and within that are in-app purchases for each of the four Māori language-learning levels. They are available in the Apple and Android versions for iPads and tablets. Each of these apps brings together the textbooks, podcasts and streamed videos, animated movies and exercises, the Te Kākano, Te Kai a Te Rangatira and Tōku Reo TV series in a structured programme. When students and teachers are working on a particular part of the textbook, if there is an exercise or relevant material to augment the learning of a particular grammar point or topic, by clicking on the button beside the text it will take them directly to the relevant exercise, podcast, animated movie, and/or streamed video. This recent development provides a very structured course, making maximum use of the range of rich resources available in the Te Whanake suite of websites. These apps also have direct access to the Te Aka online dictionary.

These four apps are a major development in making the range of Te Whanake resources less expensive and more useful. It has overcome what had become a problem for teachers and learners. Because of the plethora of useful resources developed in the Te Whanake textbooks, study guides, teachers' manuals, podcasts and TV programmes, it was difficult for both teachers and learners to make the maximum use of those resources. By developing a matrix of all the content of the resources, we are able to use a particular exercise or activity at the appropriate time. Teachers are advised to use these four apps in structuring their programmes to make maximum use of these rich resources.

Te Reo Māori app

The launching of the Te Reo Māori app for smart phones and tablets (Apple and Android) in 2010, added even more mobility and accessibility for the Te Aka dictionary. Te Reo Māori is the app version of the Te Aka dictionary. The app has two main advantages over the website:

1. When wifi or 3G/4G are available the app automatically accesses the online dictionary, but if these are not accessible the app has a recent version of the dictionary stored on the device. Thus, it can be used anywhere in the world.
2. The app has a feature, called Favourites, which enables the user to store any words

searched for. This helps the learner to revise new words.

Recent research by Te Ipukarea, the National Māori Language Institute, has delved into how users are benefitting from using the Te Aka dictionary and the Te Reo Māori app. Results of the research show that as well as using the dictionary to find meanings, they also use it to find how to use the word in a sentence. Nearly half of the users (48.6%) use the digital dictionary for this purpose, with the beginner and intermediate level learners having the highest percentage of their number using the dictionary this way. This result shows that example sentences are being used to help improve users' Māori language ability (Te Ipukarea, 2016, p. 5).

Conclusion

This case study on the benefits of the digital resources developed for the teaching and learning of Māori has focused on the Te Whanake and Te Aka websites as well as the Te Whanake and Te Reo Māori apps. Shown are the benefits of these not only as stand-alone utilities, but also to complement other resources in the suite, including the hard copy print resources.

However, to conclude on a cautionary note, websites and apps such as these do involve some significant costs to develop. They also need regular updates and maintenance, which incur further expense. Many other websites and apps charge fees and/or lease out advertising space to defray these costs. We have managed to resist both of these intrusions for all of the Te Whanake websites, while charging only a small fee for the apps. Profits from the apps are used to help defray these maintenance and development costs.

References and further reading

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