

Internet technologies as a tool in indigenous education: the case of the Wichi People in “The Impenetrable” area in Argentina

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ABSTRACT

In this paper, we present some results on the implementation of Intercultural Bilingual Education in the province of Chaco (Argentina) after 25 years from its beginnings. The data provided here show that this education modality does not fulfil the expectations promised by the government. We will also introduce a language learning project, currently ongoing, that involves collaboration between members of the Wichi people in an area known as “The Impenetrable” and the researcher. This collaborative work involves teaching and learning languages, working on the Wichi language together and the creation of a mobile app to learn the basics of the language. Especially relevant in this linguistic and pedagogical work is the fact that this collaboration is being carried out via the Internet, using digital applications with small bandwidth consumption that allow synchronous communication over mobile phones.

CCS Concepts

• Applied computing~E-learning • Applied computing ~ Ethnography • Applied computing ~ Collaborative learning.

Keywords

E-learning; collaborative learning; indigenous peoples; endangered languages; decolonization.

1. INTRODUCTION

When the Spaniards governing Argentina decided to declare their independence from Spain in 1916 and rule the conquered lands themselves, the country was about half the size it is today. They would continue the conquest to new unclaimed (by white people) territories, such as the Patagonia (from Buenos Aires to Tierra del Fuego) and what we know today as the provinces of Chaco and Formosa. The conquest of what is now the province of Chaco¹ started after the War of the Triple Alliance (1864 - 1870), in which Brazil, Uruguay and Argentina defeated Paraguay. After the war, all three victorious countries set off to enlarge their national territories with Paraguayan lands and, at the same time, to invade indigenous territories no white man had conquered until then. The “Chaco Conquest” took place between 1870 a 1917 in several campaigns led by different generals. Among these, probably the best known is Gen.

Victorica's campaign in 1884, who used massive military force against indigenous peoples who only had spears and bows, and ended most resistance in the area. Two elderly Wichi the author could interview (both passed away in 2015) still had the collective memory of the violent encounter in their territories with the conquering soldiers. Nowadays, three indigenous peoples in the province of Chaco survived the conquest: the Moqoit, the Qom and the Wichi. In Wichi territory, in the heart of a great territory full of forests in the north of the province, known as “The Impenetrable”, an inhospitable arid and dry land that even nowadays gets totally isolated if a bit of rain falls on the dirt track that extends for 265 km, lies the community I will refer to, the last indigenous people conquered in Argentina.

The first white man to live among them went there in 1971. Nowadays, Sip'ohi is no longer the name of the area, as the first mayor (another white man of the same group, who went there to bring “progress” and “civilization”, and failed) called the municipality “El Sauzalito” when it was instituted in 1973. Such a recent contact with white society and the remoteness of the village explains their vulnerability as a people and the importance of a change in education, as will be explained in this paper.

2. EDUCATION AND INDIGENOUS PEOPLES IN CHACO

In 1922, the curriculum in the first schools established for indigenous children in Argentina (provinces of Formosa and Chaco) consisted, in its practical totality, of practical work (manual work, farming and agriculture for boys and manual work, washing, ironing and cooking for girls) and Spanish language, in equal parts [2]. This shows that the aim of educating indigenous children at school was to use them as cheap labour a first step. Later, the school system's main objective would be to force the white man's cultural system on them, effectively destroying the Wichi social system, their traditional values and their way of living and doing things as The only “right way” was the one being imposed on them, which was radically different.

¹The Province of Chaco, in Argentina, should not be confused with the geographical area known as Great Chaco, which is a much wider area including territories of Argentina, Bolivia, Paraguay and also part of Brazil.

There was no interest or concern about the indigenous student's first language or cultural background. The main aim of the school system was the most effective assimilation of the child into the dominant culture: *"the school should pursue, as its main objective, to attract the aboriginal to civilized life"* (National Counsel of Education, 1937, p. 303. Cited in [1]). The only valid language at school has traditionally been Spanish (and other than some symbolic presence of the indigenous language, it still is today). The most likely outcome in these circumstances would be drastic academic failure due to the non-trivial fact that the Wichi children simply did not understand the teacher and whatever they were being told.

In the 70s and 80s, the indigenous movement in America started reclaiming their rights and demanding respect and participation. As a result, governments started changing the wording of the laws regarding indigenous education.

In 1987, the province of Chaco approved the Law of the Aboriginal of Chaco [4], with Chapter 3 dedicating three articles to talk about a type of education that should be "bicultural and bilingual" (Art. 15). That same year, the CIFMA Teacher Training Centre was created in the province to train aboriginal teaching assistants in 1989 and then, only intercultural bilingual teachers from 1994.

The new Argentinean National Law of Education in 2006 [7] includes a Chapter 11 with three articles establishing Intercultural Bilingual Education as a modality of the national education system. In theory, this type of education *"promotes a mutually enriching exchange of knowledge and values between indigenous peoples and ethnically, linguistically and culturally different populations. This favours acknowledgement and respect to such differences"* (Art. 52).

In 2010, the Chaco Government declared the Qom, Wichi and Moqoit languages official in the province, together with Spanish (Law 6604). The next year, that language officiality was regulated by means of Decree 257, establishing the measures that had to be taken regarding the rights of the speakers of those languages, which included the foundation of an Academy of Indigenous Languages, among many other things.

The province of Chaco is, by far, the province in Argentina where Intercultural Bilingual Education has more relevance, not just by the number of laws passed in favour of indigenous languages, teachers or rights, but also because indigenous peoples in the north still are considerably numerous and some of them, unlike in most of Argentina, they still speak their traditional languages.

3. INTERCULTURAL BILINGUAL EDUCATION AFTER 25 YEARS

In 2011, a report was published [9] on the socio-educative situation of children and teenagers in two Qom communities in the area of Resistencia, the capital of the province. Some illustrative results are the following:

1) Regarding children between 8 and 14 years old:

- Community A: 21.4% are 0-1 years behind in their studies; 29.3% are two years behind; 49.3% are three or more years behind at school.
- Community B: 12.5% are 0-1 years behind in their studies; 25% are two years behind; 62.5% are three or more years behind at school.

2) Regarding teenagers between 15 and 19 years old:

- Community A: Only 49.4% are studying; 5.1% of them study at the same level as children between 6 and 8 years old; 41% study with children aged 9 to 11; 5.1% with children aged 12; 33% with children aged 13-14 and 15.4% with students aged 15 to 17 years old. In other words, only 3 out of 10 teenagers between 15 and 19 in that community are, in the best scenario, studying in the level they should.
- Community B: Only 40% of teenagers aged 15 to 19 are studying; 8.3% of them study with children aged 6 to 8; 50% of them study at 9 to 11 level; 29.2% at 12-year-old level and only 12.5% of those studying are doing it at their right level (15-17), in the best possible scenario.

These results show how indigenous students are performing in the surroundings of the capital and are much worse than those of non-indigenous students in the area. Elena Duro, Head of Education at UNICEF Argentina, said at the presentation of the report *"The inequality gap between indigenous and non-indigenous children demands strong measures by the National and provincial governments"* [6].

It is important to note that in the capital roads are paved, there are frequent buses, equipped hospitals and clinics, libraries, supermarkets and things one would normally expect in a city. Chaco is among the poorest provinces in Argentina and rural areas can be extremely rural, especially in the area known as "The Impenetrable", which occupies about half of the whole province. In many areas of the province, when it rains, children do not go to school because the dirt road becomes impracticable. Furthermore, as one goes north from the capital, poverty reaches much higher levels, especially in "The Impenetrable", which is mostly Wichi territory.

4. WHY DOES INTERCULTURAL BILINGUAL EDUCATION NOT WORK IN CHACO?

Initiatives from governments responding to indigenous demands (education in this case) tend to lack a fundamental element: evaluation. Laws are passed, processes are promoted in schools, houses are given away to indigenous families, but there is usually no assessment to measure the application of those laws, the performance of children in the schools or the quality of the houses built. The demolishing report from UNICEF was published after over 20 years of having indigenous teachers in schools. I will mention only a few facts about the system that shed some light on why such appalling results were obtained.

Intercultural Bilingual Teachers have been trained since 1994, but the curriculum specific to them was not published until 2013 (initial and primary levels) and 2014 (secondary level). If indigenous teachers did not have a specific curriculum to teach in 20 years, they could not evaluate their students in any subject other than the ones any non-indigenous teacher would teach them.

In 2011, Decree 257 was published to regulate the officiality of the three indigenous languages declared the previous year. Article 4.3 of this decree establishes that the Provincial Advising Council of Indigenous Languages (a council created by the law this decree is regulating) would propose the creation of the Academy of the Indigenous Languages of the Province. This, among many other things that the Law 6604 and this decree mandated, was never actually carried out so far (five years later). The great gap between apparent progress made in paper (even if they are laws passed by the Chaco Parliament) could even be seen as intentional. At the beginning of this year, a member of Parliament [3] proposed the creation of the Institute of Indigenous Languages of Chaco at the beginning of this year. All laws regarding indigenous communities in Chaco are government initiatives which are proposed to communities (not the other way around) and approved. This Member of Parliament, who knows the Law 6604 (specifically mentioned in her proposal) and its Decree 257, decides to propose the creation of an institution that was mandated already by a law approved 5 years before...

In all these years, practically no indigenous person has obtained a university degree in Chaco, despite the fact that the main public university in the province offers grants for indigenous people since 2011. Taking into account the generalised extreme poverty in indigenous areas, the Wichi people have little options other than study to become an Intercultural Bilingual Teacher in their village. All public servants in that area of The Impenetrable, due to its remoteness and what that involves, earn almost three times the salary of a teacher in the capital of the province. This creates a great fracture among Wichi people: on the one hand, those Wichi who became teachers have a great quality of life and their problems are not the problems of the Wichi people anymore. Their concerns now are those of the teachers. On the other hand, most Wichi people, who are not teachers or public servants, basically depend on national subsidies, charity and live in extremely poor conditions.

An educational system that is often described by the government as fulfilling the needs of indigenous people (even if the laws are not really applied) can be very dangerous. That makes indigenous teachers and parents think that no demand for change is appropriate, even though Wichi students as a whole keep clearly failing to reach success in the school system. Only those who adapt to the ways of the dominant culture and language can be successful in life. The public message is respect for indigenous cultures and language and an educational system adapted to their needs, whereas the subtle message indigenous people receive is that either they become white in language and forms or they will stay poor and out of the system.

5. MOBILE PHONES AND THE INTERNET AS CULTURAL REVITALIZATION TOOLS

Argentina is a very large country with very disperse population. Educational options imply expenses of travel, accommodation and food away from home, on top of education fees when applicable. Taking into account that Chaco is one of the poorest provinces in Argentina and that the Wichi people are far from being integrated into the dominant culture, options to travel to obtain an education not available in their home place are very unlikely.

National programs like “Conectar Igualdad”² (2010-2016) provided netbooks to all students and teachers in public secondary school, special education and teacher training centres in the country. It also provided Internet access (with variable results depending on the place) to all public centres. Although suspended this year by the new national government, this program provided many households with computers they could have never obtained in any other way due to the poverty they suffer.

On the other hand, mobile phones are very common among indigenous people in Argentina, especially among young people. Lower class Wichi will use them mainly to send text messages and stay in touch with friends and family. Not having landlines or even electricity in many cases, their only option to contact others is the mobile phone (normally with prepaid SIM cards). Wichi teachers will have smartphones with a data plan, and most of them have accounts on the most widely-used social networks.

This technological scenario, reaching as far as the most remote areas in The Impenetrable (with the Internet connection not being as reliable or fast as in the city, as it would be expected), provides a great opportunity to create new learning and teaching scenarios that may have great consequences in this situation. There are two important implications in this kind of Internet-mediated training:

- 1) One is the autonomy it provides. Contents, methodology or participants, everything can be decided freely without any bureaucracy and implemented as many times and for as long as they think fit.
- 2) Platforms such as Facebook, Whatsapp or Telegram allow groups of people to organise themselves easily and effectively, with a minimum learning curve. Also, there are many other free powerful and free apps to share all types of files or to communicate with voice with minimum bandwidth consumption. This enables people to create and use simple but efficient learning environments with a minimum effort.

For a wider description of the five different broad stages proposed to achieve endangered language and culture revitalisation much more effectively and efficiently with the help of the digital technologies and the Internet, see [8].

2 <http://www.conectarigualdad.gob.ar/>

6. REVITALISING INDIGENOUS LANGUAGES VIA THE INTERNET

Our current research involves a study and proposal for learning indigenous languages with the help of mobile technology. Wichi people (most of them) still speak their traditional language due mainly to their remoteness and the racial segregation in the area. However, Spanish is replacing Wichi in more Wichi families as time passes, especially in mixed marriages. The fact that most students normally speak Wichi as their first language implies that the symbolic time devoted to language learning in the school consisted basically in learning how to write and read it, with a variable and not very consistent orthography. The extremely scarce language teaching resources limit to a great extent the possibilities of the language to be learned by students, Wichi who may have lost the language or non-Wichi.

Language is probably the most important identity feature in a people and the hardest to recover once it is lost, as many indigenous peoples everywhere around the world have been experiencing after whole generations were sent to residential schools, often run by religious orders, where no indigenous language was allowed.

Unlike teaching a well-documented European language, we are talking about languages that have been studied by linguists who can describe them, but most often cannot hold a conversation in them. Although it might be arguable, our view is that a language can better be taught if it has previously been learnt. Being native speakers does not imply knowing why one says things one way or another, which is the problem languages face when generational transmission of the language is lost.

The proposed methodology involves three different stages:

- 1) First of all, the collaboration of indigenous native speakers is required. After ten years working with the indigenous peoples of Chaco, there is confidence between researcher and members of the communities to obtain this collaboration. The innovation in this case is that this collaboration takes place online, via synchronous and asynchronous text and audio, which offers a huge potential in terms of the efficiency of collaborating without having to necessarily be physically there with all the expenses involved.
- 2) To address the problem of the lack of a methodology for non-native students, an agreement has been made with two native speakers. They teach us their language for two hours a week and we teach them English the same number of hours. This language exchange has been taking place for a few weeks now and it is proving extremely useful and productive, especially in the collaborative process of finding out how the language works in a joint effort by native speaker and linguist, online, thousands of miles away from each other.
- 3) The final step of this process will be the creation of a mobile app to provide a basic overview of the language, with a combination of audio, pictures and text, grouped in sentences, semantic fields and a glossary. The app will be freely available for Android and iPhone and will be free software based on free software platforms. The Wichi language, as all languages with a reasonable number of speakers, has some dialects. This app will be based on the Chaco dialect, which is very different from the dialect spoken in the neighbouring province of Formosa. It is so different that we have observed that when two Wichi speakers from these two dialects meet, they speak in Spanish to overcome the intelligibility problems. This initial version will only include the Chaco dialect of the Wichi language.

7. CONCLUSIONS

Indigenous rights, values and way of living do not fit in our dominant capitalist, individualistic culture. Ideally, the education system should incorporate the indigenous language and culture into the school system to enrich society and also to learn from them some relevant and necessary values nowadays, such as solidarity, community and sustainability. That is actually the wording we can find in the laws passed on the subject, celebrating diversity, bilingualism and interculturality in society. However, accommodating the language and culture of the colonised involves a considerable effort on the part of the Administration and, taking into account that indigenous peoples very often lack the resources to fight the dominant system, it is just easier and more convenient for the dominant culture to subtly assimilate indigenous cultures and force them to adapt to the imposed new ways. That is why indigenous languages keep losing speakers and one language disappears every two weeks [5].

Once the armies do their job, the school systems continue the imposition of the dominant culture's ideology onto everyone in the conquered territory. Nowadays it is no longer acceptable to explicitly promote "civilization of the savages" (as it was officially said a century ago), especially taking into consideration the international view in the matter, as Argentina has ratified the Indigenous and Tribal Peoples Convention by the International Labour Organization (commonly known as Convention 169) and signed the United Nations Declaration on the Rights of Indigenous Peoples. Nevertheless, although appearances and official statements referring to indigenous peoples have changed, the assimilation process remains the same. This explains why laws are passed but not necessarily implemented or initiatives or projects are promoted but never assessed.

Nowadays, the Internet and common devices, such a mobile phone, allow for long distance cooperation between scientists and indigenous peoples and join forces together in extra-curricular educational projects to revitalise their languages and cultures without most of the obstacles such a project would entail without these new technologies. The potential of this type of online cooperation is very remarkable, as remote and vulnerable communities could receive very accessible education and support not just regarding their language, but also in health education or information on law and regulations that affect them, to give a few examples.

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