Blended language learning in a language revitalization context

Edwin Ko (UC Berkeley), Julia Nee (UC Berkeley), Catherine O'Connor (Boston University), and Erica Carson Jr. (Redwood Valley Rancheria)

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Problem space

We spend a great deal of time developing digital tools for use in language revitalization efforts, i.e.:

- Augmented reality app (e.g. Lacho 2018)
- CD-ROMs (e.g. Villa 2002)
- Computer software (e.g. Hermes et al. 2012)
- Online dictionaries (e.g. Garrett 2011, 2018)
- Online language resources (e.g. Junker et al. 2016, Genee and Junker 2018)
- YouTube videos (e.g. Smith et al. 2018)

However, we do not spend enough time evaluating and assessing their usefulness and effectiveness (Galla 2009, Hermes et al. 2016, Ward 2018).

Problem space

When we do evaluate (as in this study), we find that the resources are not being used as effectively as we had hoped.
- Learners don't know about the resources
- Once they locate them, they have difficulties using them
- The tools they want aren't available

This ineffectiveness is due (at least in part) to a shortage of communication between developers and users (cf. Holton 2011:381).
- Users don't receive sufficient training
- Developers don't get consistent feedback

Problem space

We address this shortcoming by teaching users how to interact with digital resources in a **blended learning environment** where learners use digital resources while also interacting face-to-face.

Three key features:
- Fun, group activities that have a goal/task (Riestenberg & Sherris 2018; Long 2015)
- Learners must use the digital resource to complete the task
- The task is linked to overarching community goals (Riestenberg & Sherris 2018; Long 2015)

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Northern Pomo

Northern Pomo is one of seven distinct Pomoan languages, traditionally spoken in Northern California in and around Mendocino County.

Today, there are no living speakers, but there is a community that identifies with the language.

Beginning in the late 20th century, linguists at UC Berkeley, Eero Vihman and Catherine O'Connor, worked to record the language.

Northern Pomo

Recordings of Northern Pomo feature the voices of Edna Campbell Guerrero (left), Elenor Stevenson Gonzales (center), and Annie Lake (right).

These recordings are the only way to access the language, so language revitalization activities rely on digital tools for listening to these resources.

Northern Pomo Language Tools

In 2014, a team led by Catherine O'Connor, which includes Edwin Ko, at Boston University began (and continue) to develop a website for learning Northern Pomo, that consists of several components to target different goals learners may have.

http://northernpomolanguagetools.com

northern pomo language tools
- how to use the website
- about the language
- sounds and letters
- talking dictionary
- phrasicon
- stories & texts
- lessons & games
- qr codes at the grace hudson museum
- links to mobile apps
- contact us

Northern Pomo language camps

In summer of 2018, Erica Carson Jr., a learner-teacher of Northern Pomo, invited us to co-organize a Northern Pomo weekend language camp.

We have since held two weekend language camps at Redwood Valley Rancheria in March 16-17 and June 29-30. Each day lasted 6 hours, starting at 10am and ending at 4pm.

The camps were open to all and were attended by children, adolescents, adults, and Elders.

Planning

How do we plan the two-day language camp so that it can make the most impact to people who are interested in learning Northern Pomo?

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Objectives

1. Navigate the online resources for Northern Pomo
2. Connect learners to digital resources in a way that is personally meaningful
3. Identify and collaborate with fellow learners (of different ages and tribal affiliations)
4. Build a safe, fun, supportive environment for learning and making mistakes

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Kinship term activity

1. Teams were given flashcards with kinship words in English

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MENU

my mother
ʔaːmi-tʰe

noun   my mother

Example phrases (phrasicon)

ES   ▶ 0:00 / 0:03 ● 🔊 ⋮

AL   ▶ 0:00 / 0:03 ● 🔊 ⋮

EC   ▶ 0:00 / 0:02 ● 🔊 ⋮

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Kinship term activity

1. Teams were given flashcards with kinship words in English
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3. Teams completed the flashcards
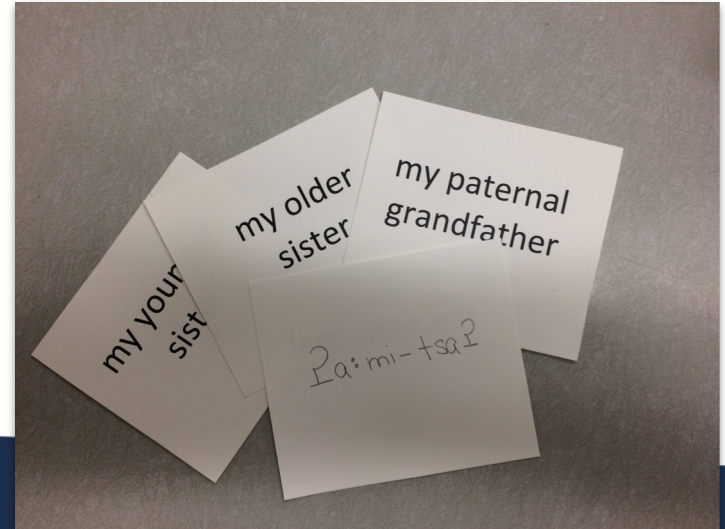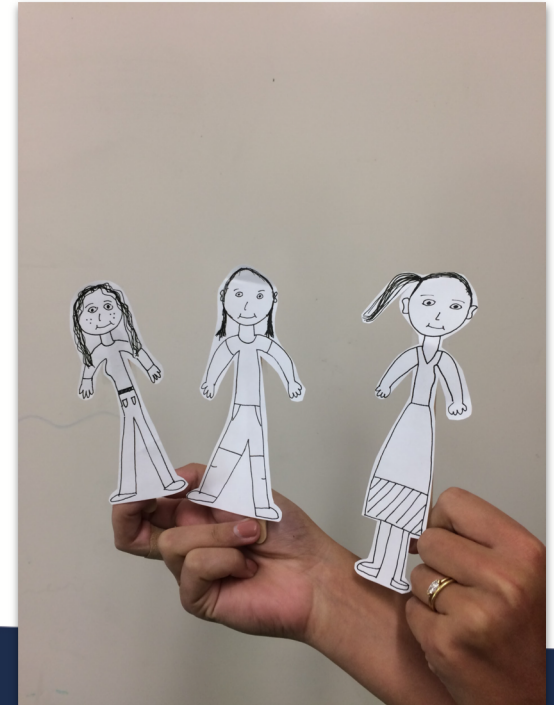
Kinship term activity

1. Teams were given flashcards with kinship words in English
2. Leaders modeled how to look up a word in the talking dictionary
3. Teams completed the flashcards
4. Made and presented stick puppets of their family members

Objectives

Kinship activity

1. Navigate the online resources for Northern Pomo

1. Learners used the talking dictionary to find words

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1. Learners used the talking dictionary to find words
2. The words were significant to learners as they referenced close relations

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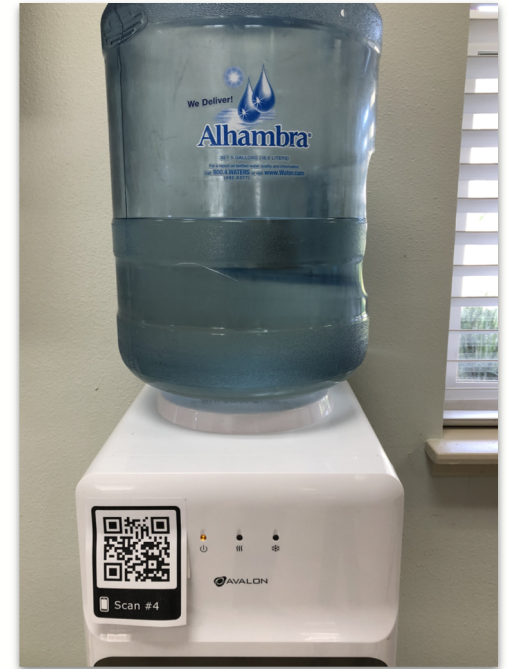4. Craft allowed for individual expression and relaxation

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QR codes scavenger hunt

QR codes are barcodes that, when scanned with a mobile device or tablet, sends the user to a webpage.
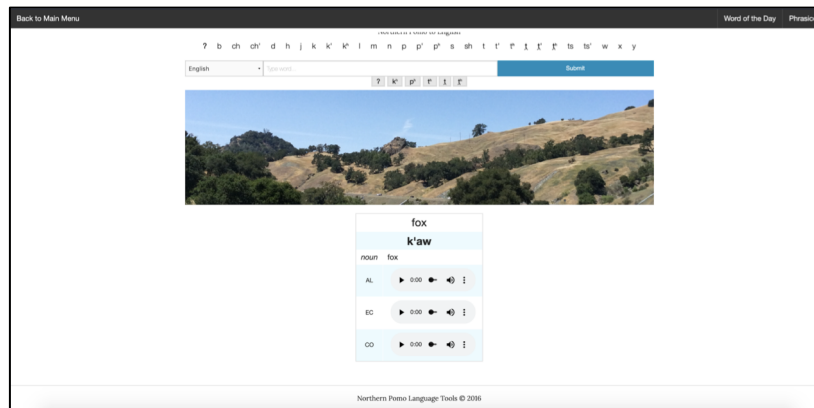
QR codes scavenger hunt

1. QR codes that bring users to a certain dictionary entry were placed around the building next to relevant objects or images.

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Scan #2

2. _____

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3. Learners had to locate the QR codes, scan them, and write down the Northern Pomo word and English translation onto the worksheet.

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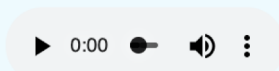
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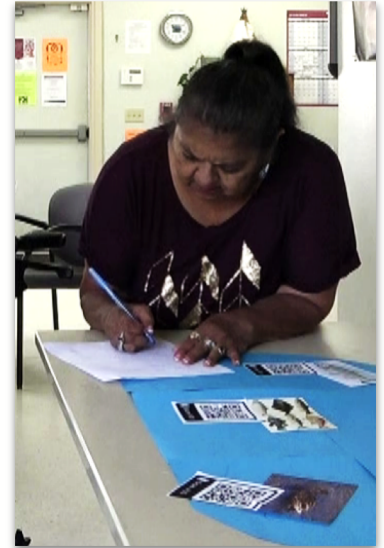
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2. Each team was provided with worksheet with numbered blank lines that corresponded to a QR code.
3. Learners had to locate the QR codes, scan them, and write down the Northern Pomo word and English translation onto the worksheet.
4. At the end, we reviewed all the words as a group.

Objectives

1. Navigate the online resources for Northern Pomo

QR code activity

1. People noticed and commented on the different ways entries were structured.

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Objectives

1. Navigate the online resources for Northern Pomo
2. Connect learners to digital resources in a way that is personally meaningful

QR code activity

1. People noticed and commented on the different ways entries were structured.
2. People enjoyed learning new words using this approach.

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Objectives

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QR code activity

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3. Non-tech savvy learners teamed up with others.

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QR code activity

1. People noticed and commented on the different ways entries were structured.
2. People enjoyed learning new words using this approach.
3. Non-tech savvy learners teamed up with others.
4. Some people were unable to find all the QR codes, but we reviewed all words at the end.

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Sounds and letters bingo

1. Review the sounds and letters of Northern Pomo, focusing on contrasts

Sounds and letters bingo

1. Review the sounds and letters of Northern Pomo, focusing on contrasts
2. Play bingo! (tinyurl.com/northernpomobingo)

Northern Pomo Sounds

x	pʰ	ʔ	t̪ʰ	ts'
k	p	k'	ch'	ts
a:	t	kʰ	t̪'	l
u	s	sh	u:	o:
o	e	n	tʰ	w

myfreebingocards.com

Objectives

1. Navigate the online resources for Northern Pomo

Bingo activity

1. Learners saw how to navigate the sounds and letters page

Objectives

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Bingo activity

1. Learners saw how to navigate the sounds and letters page
2. Learners were motivated to win!

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Bingo activity

1. Learners saw how to navigate the sounds and letters page
2. Learners were motivated to win!
3. Learners worked together to identify sounds and letters

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Bingo activity

1. Learners saw how to navigate the sounds and letters page
2. Learners were motivated to win!
3. Learners worked together to identify sounds and letters
4. Learners practiced producing the sounds and making mistakes

Phrasicon story creation

1. Demonstrate how to use the Phrasicon

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Phrasicon story creation

1. Demonstrate how to use the Phrasicon
2. Provide an example book and demonstrate how we found the sentences

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Phrasicon story creation

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3. Learners work (asking others for help) on their own books

Phrasicon story creation

1. Demonstrate how to use the Phrasicon
2. Provide an example book and demonstrate how we found the sentences
3. Learners work (asking others for help) on their own books
4. Present the books for the class
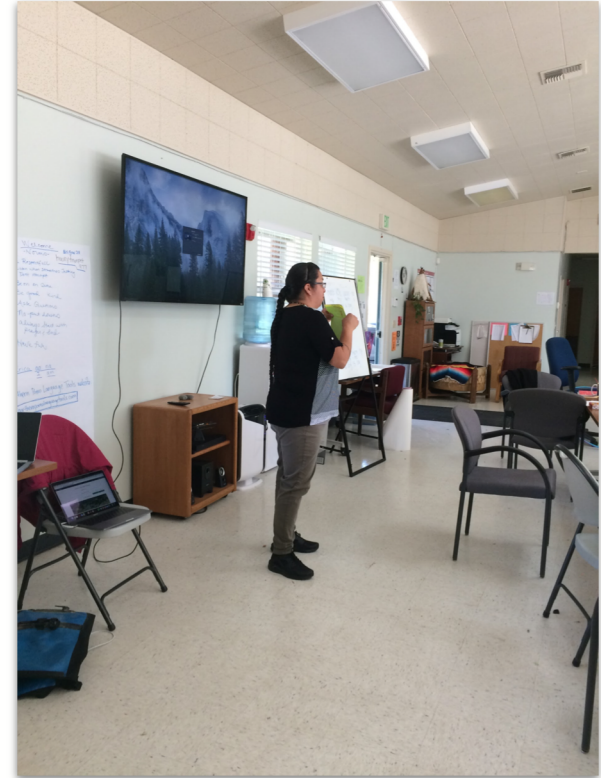
Phrasicon story creation

Grammatical sentences copied from classroom activities.
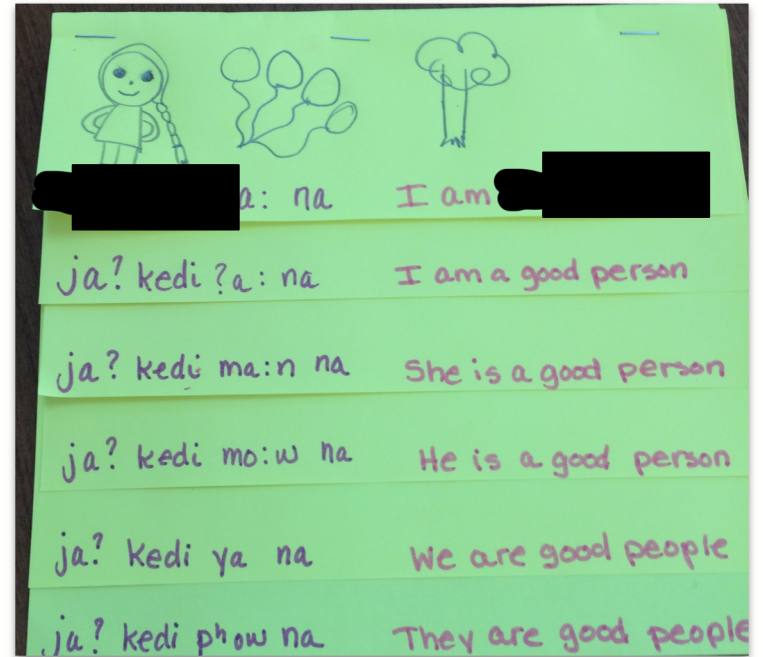
Phrasicon story creation

Sentences adapted from the Phrasicon with grammatical "errors" (such as missing copula).
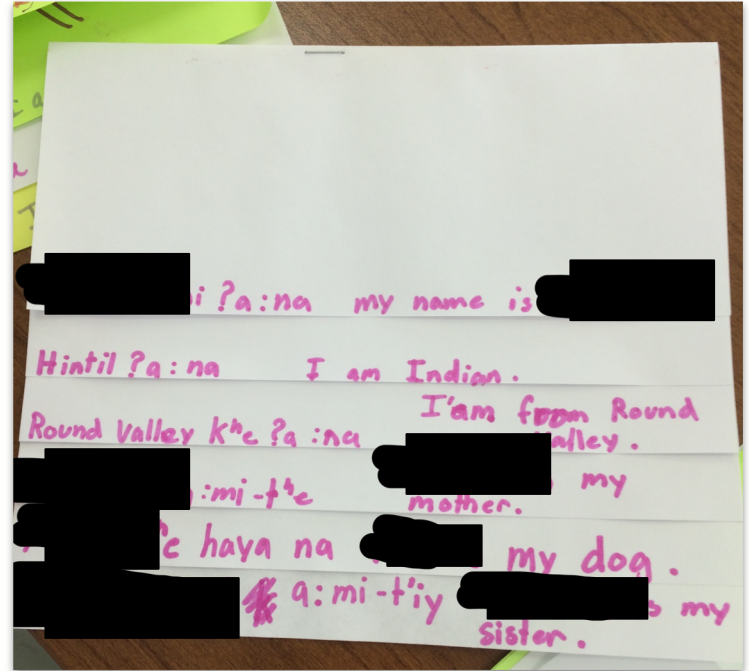
Phrasicon story creation

Creative use of the Phrasicon and Talking Dictionary to create new Northern Pomo sentences.
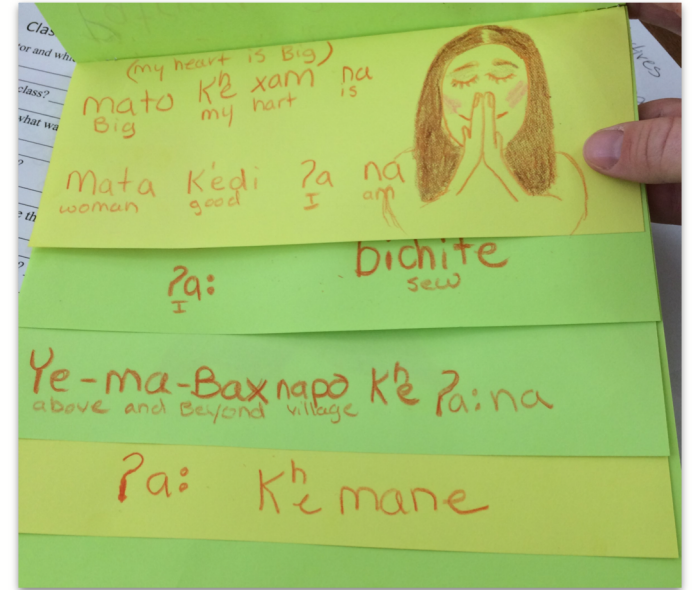
Objectives

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Phrasicon activity

1. Learners used the Phrasicon and talking dictionary

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1. Learners used the Phrasicon and talking dictionary
2. Learners could decide on their own what to write about (based on what was available online)

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Phrasicon activity

1. Learners used the Phrasicon and talking dictionary
2. Learners could decide on their own what to write about (based on what was available online)
3. Participants asked each other for help
4. Learners felt comfortable to read their stories at the end

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Observations & Participant Feedback
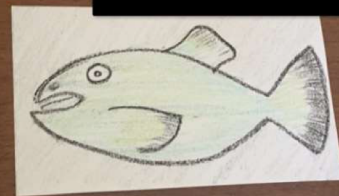
Did they navigate the online resources?

- Students from the first camp were able to use the website at the second camp.

- What did you learn in this class?
  → *Use phrasicon*
  → *How to get app on I-Phone - able to type word & get Pomo language*

- Would you continue to use what you learned today in life?
  → *Yes we will continue to practice at home and refer to the website.*
  → *Yes, I will use the website to continue to learn more words.*
  → *Yes, the language app will be used again.*

Did learners connect to resources in personally meaningful ways?

- Eight students mentioned the book creation as their favorite activity, which involved using digital tools to create a unique, personal project.

- Learners said they would use the resources to learn more words.
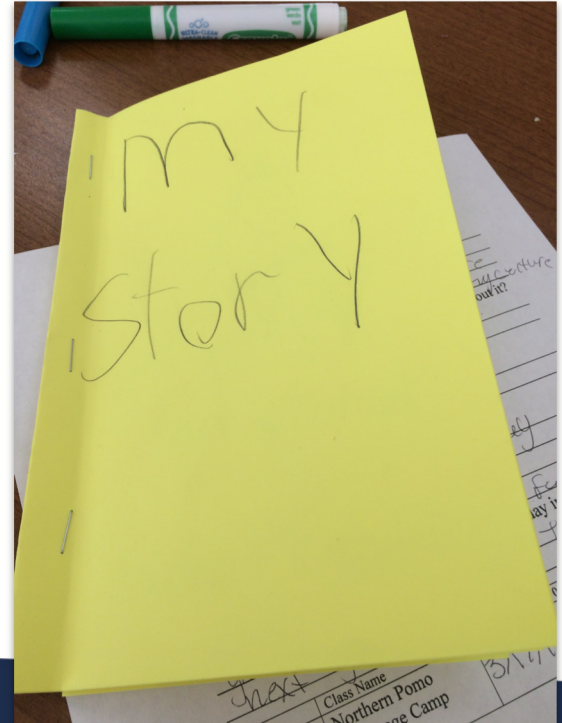
Did participants collaborate with fellow learners?

- Would you attend this class again and why?
  - → *Yes because I like to meet people.*
  - → *Yes. I love learning my language and want to share w/other/use language everyday.*

- What do you think would help improve this class?
  - → *By having all my family here.*

Did participants collaborate with fellow learners?

- When attending today's class what was your favorite part about it?

    → *The games, team work…*

    → *Sharing projects and speaking with others*

    → *being together is always good*

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Was the environment safe, fun, & supportive?

- What did you learn in this class?
  - → *I'm not too old to learn to keep up.*
  - → *I can speak Pomo.*

- Would you attend this class again and why?
  - → *Yes because it was fun*
  - → *Yes cause it's really fun*

- When attending today's class what was your favorite part about it?
  - → *All the fun we had while learning.*

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Did we get feedback as developers?

- Observed how people interact with the resources.

- Highlighted issues in searchability of the talking dictionary and Phrasicon.

- Created a deeper relationship so that users feel more comfortable reaching out with future feedback.

Lessons learned: Providing training to learners

We should provide ongoing training and formative evaluation of the digital resources (no matter how easy you think you made it!).

"...glitzy technology tool receives its glory while under development, but when released little priority is given to training in its use, implementation in appropriate settings and generally using it to achieve the community's stated goals." (Galla 2016: 11)

"Without face-to-face engagement with the users, we cannot know exactly how the materials are being used." (Smith et al. 2018: 506)

The blended learning environment was an effective way to train learners on how to use the tools as well as get rich user feedback.

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Lessons learned: Contextualizing language use

Digital tools are essential for learning dormant languages, but building community is also crucial to learner investment.

"If learners feel positive about their interactions with classmates, they are more likely to develop positive identities as students of the language. In this way, [promoting cooperative collaborative learning] can be expected to contribute to learner investment." (Riestenberg & Sherris 2018: 452)

A blended learning environment can foster a community of learners who actively use the language with each other, while leveraging useful digital tools for language learning.

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