

The Electronic Journal for English as a Second Language

## **Duolingo**

**May 2015 - Volume 19, Number 1** 

Title	Duolingo
Author	Duolingo Inc.
Contact Information	https://www.duolingo.com/ https://itunes.apple.com/us/app/duolingo-learn-languages- for/id570060128?mt=8 https://play.google.com/store/apps/details?id=com.duolingo&hl=en https://www.windowsphone.com/en-us/store/app/duolingo-learn-languages-for-free/2d89520e-d360-4b5b-ba5a-5a15064aa935
Type	General language learning app
Platform	Web browser, iOS, Android, Windows phone
Current Compatibility	Up to date web browser, iOS 7.0 or later, Android, Windows Phone 8.1
Price	Free

# **General Description**

### **Overview**

Boasting over 20 million users, Duolingo is a browser-based and mobile application launched in 2012 that allows users to "Learn a language for free. Forever" (Duolingo, 2014). Currently, full versions are available in Spanish, French, Italian, German, Portuguese, and English with other languages under development. Duolingo calls language learning with the application "fun and addictive" as users "earn points for correct answers, race against the clock, and level up" (Duolingo, 2014). The company prides itself on "bite-size," "effective" lessons that fit into your daily life (Duolingo, 2014) and claims the program is more efficient for language learning than a university course, estimating that 34 hours using Duolingo is equivalent to the instruction provided in a 16-week university semester (Vesselinov & Grego, 2012).

Duolingo is ad- and cost-free due to its monetization of built-in user translations of webpages in immersion activities on the web version. Available as a browser-based application or an iOS, Android, or Windows Phone application, Duolingo uses a single

user account setup by way of an email, Facebook, or Google account to sync progress across all platforms. Since user experience and available features vary across platforms, this review will focus on the iOS iPad version of Duolingo, Apple's 2013 App of the year (Duolingo, 2014) in English (L1) with French as the target language (L2).

#### Structure

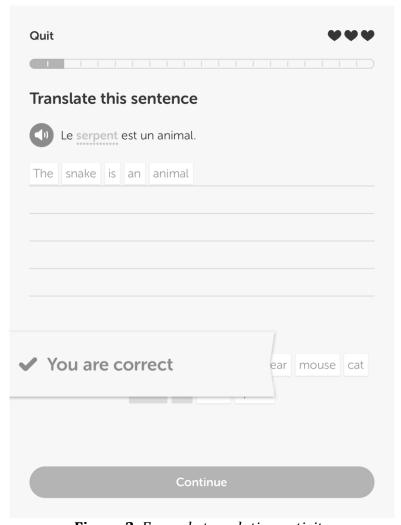
The app's home screen displays Duolingo's language-learning tree (see Figure 1). The one to three circles in each row of the tree represent units that must be successfully completed before a user can move to the next row of activities. Units tend to be semantically or grammatically themed, with content-oriented themes such as "animals" or grammatically focused themes such as "possessives." Completion of all 68 units is equated with a high-intermediate, or B2 on the CEFR, level of proficiency according to Duolingo's founder (Vesselinov, 2014).



**Figure 1**. *The main screen language-learning tree* 

Each unit contains a linear sequence of lessons, each made up of a set of chronologically ordered activities facilitated in the L1. Despite Duolingo claiming "a variety of speaking, listening, translation and multiple choice challenges," ("Duolingo," 2014) the vast majority of these activities involve translation of a sentence or phrase usually through

selection from a word bank as seen in Figure 2. Other exercises include verbal repetition of a spoken or written L2 structure and dictation, which allows for multispeed audio replay. New L2 words give the user the ability to access various highlighted L1 pop-up gloss options, and most exercises offer optional corresponding spoken L2 text. All exercises offer immediate color and sound coded textual animated feedback on correctness, and items answered incorrectly may be repeated later in the lesson. Each lesson allots a given a number of hearts, usually three to four, that are eliminated for each incorrect answer. When no hearts remain, incorrect responses result in restarting the lesson. Progress through a lesson is visually tracked by way of an incremental progress bar at the top of the screen.



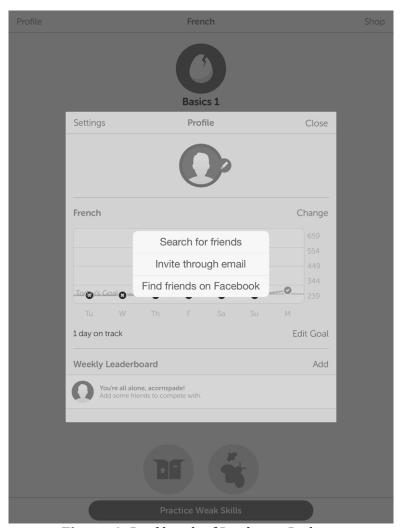
**Figure 2**. *Example translation activity* 

Correct responses and completed lessons, units, and levels earn language experience points used to track progress. In addition, accomplishments, such as completion of a unit, are rewarded with lingots, Duolingo's own currency which can be used at the lingots shop to buy extra hearts or outfits for the Duolingo mascot (see Figure 3). Users can track their progress on a line graph found under the profile link at the top of the

screen. The profile link also allows users to change their goals or settings, see the weekly leaderboard of friends' progress, or add additional friends (see Figure 4).



Figure 3. A screenshot of the Duolingo lingots shop



**Figure 4**. Profile tab of Duolingo iPad app

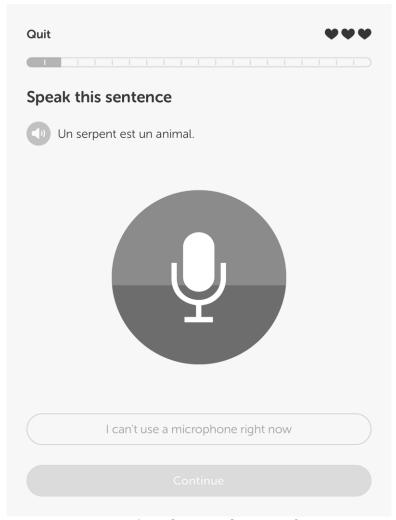
### **Evaluation**

### **Technological Features**

When it comes to technological considerations, such as layout, sound and visual affordances, Duolingo capitalizes on some features while also showing room for improvement. Duolingo has taken obvious care to simplify the screen layout for mobile devices, allowing for both vertical and horizontal orientation of the fairly intuitive L1 interface with simple navigation. Colors are used effectively to show language learners' progress in a visual way by coloring accessible unit icons and presenting currently inaccessible units in gray scale (see Figure 1 above). This is a welcome design choice given that the "tree" or unit map is several pages long.

The sound quality is clear overall, though it occasionally sounds computer generated and sometimes experiences lag or fails to play in some audio-augmented touch-based activities. The program takes advantage of the microphone for users' spoken translations and seems adept at accepting less than perfect learner pronunciation. Microphone lag is rare, and the interface shows a visualization of recorded volume for immediate user

confirmation (see Figure 5). One strength of the speaking interface is the button that allows users to skip audio-based activities for a specified period of time or turn them off entirely. This can be a valuable option when using the app in public and desiring muted audio.



**Figure 5**. *Audio recording interface* 

The app also effectively utilizes the automation and social capacity of mobile devices to motivate users and track progress, capitalizing on such functions to offer users the ability to compete with friends using the program, and monitor achievements through on screen pop-up and email reminders to help users stay on track with their individualized goals. However, considering Duolingo's use of CALL affordances broadly, the app ignores the effectiveness of input elaboration (Chapelle, 2003), limiting its use of input enhancement to salience and modification. A moderate level of salience is realized largely through repetition and some marked input, such as the highlighted new vocabulary, while L1 pop up glosses and occasional images comprise the primary attempts at modification, leaving much to be desired in directing learner attention to input. The expansion of input enhancements to include elaboration could provide the

context and explanation needed for a more complete understanding of the target language.

### **Pedagogical Considerations**

Pedagogically, Duolingo falls into digital game based learning (DGBL) and adheres to many of its tenets fairly well. Animation, sound effects, rewards for achievement, and competition with others, all recognized elements of successful DGBL (Intratat, 2011; Prensky, 2003), are incorporated effectively. However, Duolingo falls short of Prensky's (2003, 2005) requirement that DGBL attain a high level of both engagement (play) and learning. While Duolingo begins to address both of these areas, it fails to do so at a high level. The incorporation of more game-like aspects, input elaboration, or integrated language use scenarios could boost potential users' level of engagement and learning potential.

The strict linear structuring of Duolingo suggests a clearly envisioned curriculum, but apart from incrementally introducing vocabulary and simple grammatical structures, the sequencing of material can feel arbitrary to a learner. Grammatical structures provide continuity, but this often gives much of the language a fabricated feel. This lack of authenticity is furthered by Duolingo's dearth of opportunities for meaningful communication, leaving the program in the grammar translation era with a behaviorist focus on repetition. More modern interactionist and sociocultural SLA expectations of negotiated meaning in context and multiple forms of interaction are not met, as the program relies solely on small, disconnected, and decontextualized chunks of isolated language; this decontextualization subsequently restricts meaning making. In the worst cases, such isolated language appears to make little sense, such as "he owes a chicken." Without the use of input elaboration or context, the user is left not knowing whether such examples are as odd as they seem or if they might hold specialized meaning in particular contexts. Many sentences, such as "I am a lion," "he has a tiger," or "it's eating a butterfly," seem to have been included not for their utility or authenticity, but rather to mimic simple grammar constructions from previous units, such as the patterns "I am a boy," "he has an apple," and "he is eating an apple." While this may serve to reinforce the construction, the result is a series of odd sentences that often lack relevance for a learner. This is a serious weakness of the app from a DGBL perspective, as relevance is the dominant predictor of user satisfaction (Huang, Huang, & Tschopp, 2010).

### **Target Use**

Target users of the app would be autonomous users with some existing level of motivation or curiosity for language study who are seeking to refresh basic skills. Those who can convince friends to study and compete with them can take advantage of the social motivation features and perhaps receive more benefit from use of the app.

However, due to the highly structured linear nature of the program, Duolingo would be difficult to incorporate into a classroom setting and would not be a good match for highly independent users looking for individualized or flexible learning opportunities. Those looking for advanced proficiency practice or authentic language examples will not find this app a suitable fit. The Duolingo app is probably best used as a supplement to other language learning materials that offer more contextualized authentic language use.

Duolingo can be viewed as a basic mobile game that may offer some simple language learning benefits.

### Summary

Overall, Duolingo offers a fairly convenient, free, and basic mobile learning application which contains motivational DGBL features that give it enough of an addictive edge for many learners to stay engaged. However, its strict linear curriculum, lack of authentic language, and limited assortment of activities prevent its full realization, relevance, and utility as a DGBL opportunity. Its design makes Duolingo a solid choice for independent supplemental practice, but acts more as a fun refresher than a comprehensive language learning experience.

### References

- Chapelle, C.A. (2003). English language learning and technology. Lectures on applied linguistics in the age of information and communication technology (Vol. 7). Philadelphia: John Benjamins Publishing Company.
- Duolingo. (2014). Retrieved September 8, 2014, 2014, from <a href="http://www.duolingo.com">http://www.duolingo.com</a>
- Duolingo. (2014, Sept. 16, 2014). Duolingo-learn languages for free. Retrieved Oct. 1, 2014, 2014, from <a href="https://itunes.apple.com/us/app/duolingo-learn-languages-for/id570060128?mt=8">https://itunes.apple.com/us/app/duolingo-learn-languages-for/id570060128?mt=8</a>
- Huang, W.-H., Huang, W.-Y., & Tschopp, J. (2010). Sustaining iterative game playing processes in DGBL: The relationship between motivational processing and outcome processing. *Computers & Education*, *55*(2), 789-797. doi:http://dx.doi.org/10.1016/j.compedu.2010.03.011
- Intratat, C. (2011). Alternatives for making language learning games more appealing for self-access learning. *Studies in Self-Access Learning Journal: Special issue on CALL, E-Learning, and M-Learning, 2*(3), 136-152.
- Prensky, M. (2003). Digital game-based learning. *Computers in Entertainment*, 1(1), 21.
- Prensky, M. (2005). Computer games and learning: Digital game-based learning. In J. Rasessens & J. Goldstein (Eds.), *Handbook of computer game studies* (pp. 97-122)
- . Cambridge, MA: MIT Press.
- Stevenson, S. (2014). How do you say addictive in Spanish? The wonderful free language app that makes learning new tongues incredibly fun. *Slate*. <a href="http://www.slate.com/articles/technology/technology/2014/01/duolingo\_the\_free\_language\_learning\_app\_that\_s\_addictive\_and\_fun.html">http://www.slate.com/articles/technology/technology/2014/01/duolingo\_the\_free\_language\_learning\_app\_that\_s\_addictive\_and\_fun.html</a>
- Vesselinov, R., & Grego, J. (2012). Duolingo effectiveness study. Retrieved from Duolingo website: <a href="http://static.duolingo.com/s3/DuolingoReport\_Final.pdf">http://static.duolingo.com/s3/DuolingoReport\_Final.pdf</a>

### **About the Reviewer**

**Kelly J Cunningham** < kellyc@iastate.edu> is currently a PhD student in applied linguistics and technology at Iowa State University where she studies the effects of technology use in second language writing feedback.

Copyright © 1994 - 2015 TESL-EJ, ISSN 1072-4303 Copyright rests with the authors.