

Olivia Saad

So Predictable

Famous '*shortcut tool*' benefitting society in ways you wouldn't expect

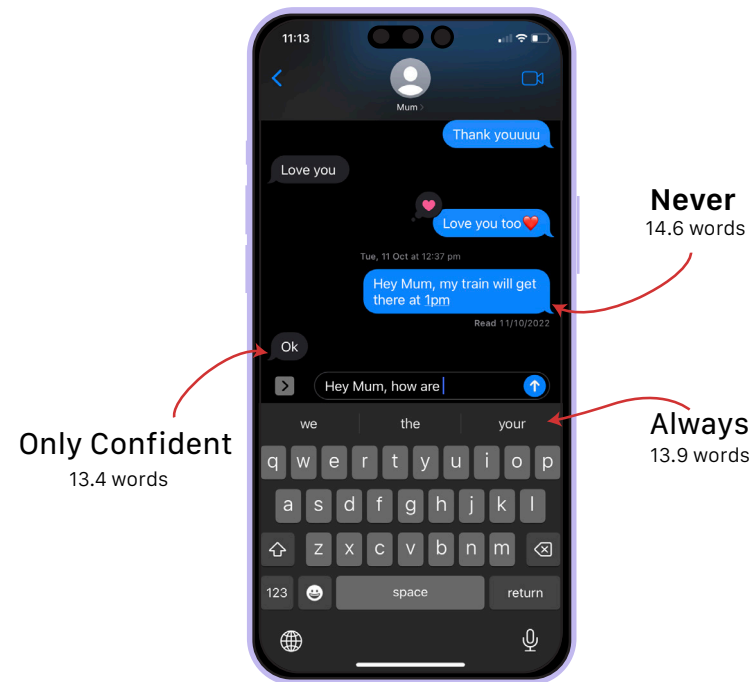


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Predictive text is currently implemented within Apple iPhones changes the way we communicate. Through its ability to scan the words we type, what we have searched and our conversation history; it can predict our form of language with calculated words and phrases to help 'fill in the blanks' more efficiently. Between emails and everyday messages, predictive text does it all. It's also possible to customise how these predictions work, allowing for more accuracy to the phrases and words intended for every individual user. The technology used is known as "Smart Compose" which is the general makeup of how predictive text works, has been implemented as a helpful tool for all of Apple's users in their day-to-day communication.

There is a notion that predictive text leads to more 'predictable writing,' limiting our individual style. Predictive text was first introduced to assist



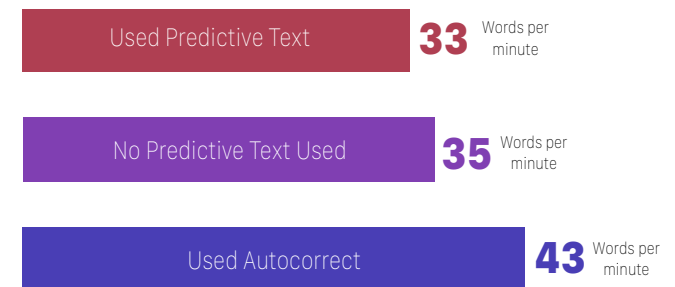
with people who experienced "motor impairments and people who were considered poor typists" as stated by John Darragh and his colleagues but due to its advancements in Apple's technology, it is now widely used by all people everywhere. A study that had been conducted by a group of professors had gathered 109 participants to write captions for images. In this study the professors had altered the simulation of predictive text suggestions where there were multiple levels categories of how the suggestions behaved. They included; 'always' – where the keyboard always showed three predicted words in the suggestion bar, 'never' – no suggestions were shown and 'only confident' – which only showed suggestions that the technology thought was certain to be selected based on what was written. The 'Never' category had the highest average words written (14.6) out of the three categories while 'Always' had 13.9

words and 'Only Confident' had 13.4 words. It is evident that having no suggestions, allows for more detail to be provided as users are not limited by what's predicted in their captioning. They are more individually unique and less predictable. This is backed by a similar 2019 study by the University of Cambridge, where their participants (3700) had copied out sentences as quickly as they could. The results had concluded that participants who had used predictive text tools had typed an average of 33 words per minute, which ended up being slower in comparison to participants who didn't use any suggested phrases, where they averaged 35 words per minute and the participants who had used autocorrect had averaged to 43 words per minute, being the fastest out of all three categories and much faster than people who had used predictive text. Although being marketed as a shortcut tool, it's evident that no real time is saved.

While predictive texting doesn't improve speed, it can improve individual's spelling through constant exposure. Professor Conti-Ramsden and her colleagues found that adolescents who had a lower ability in language had leaned away from using autocorrect in their typing as the suggested text can create unintended words that are not related due to the misspelling of their text. It was stated by Maureen Dixon and Zofia Kaminska; "Because previous research has shown that exposure to correct spellings improves spelling performance in adults it could follow that predictive messaging would have a positive impact on the literacy-related skills of adult texters." In this way, predictive text becomes more practical in the sense of correcting the way we communicate.

Apple's predictive text, although marketed as an efficient, shortcut tool, has not affected the speed of our typing in the way you would expect. In fact, the regular QWERTY keyboard is faster without predictive text. The tool makes

your writing more predictable by suggesting short phrases and words that relate to the content, limiting our natural, unique writing style. Lastly, and most significantly predictive text has been found to not improve much of our typing speed but instead help more people correct their spelling and punctuation within day-to-day communication. Predictive text, therefore, is beneficial in ways the everyday person would not expect.



References:

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How does Predictive Text Work?

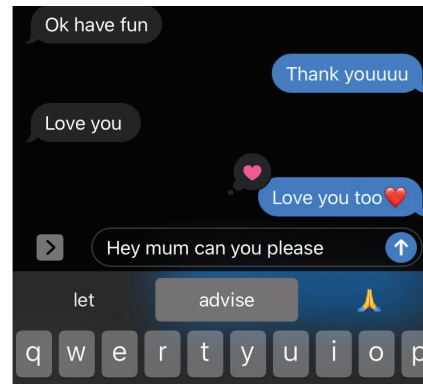
1 Local Dictionary is Built



Phrases and words frequently used are scanned and collected, building up a "local dictionary."

2 A score is given to the suggestion based on if it is accepted or ignored

Accepted Suggestion



Ignored Suggestion



When a suggestion is accepted it is given a score based on the likeliness of it being used again. If a suggestion is ignored the suggestion will be given a lower score.

3 Changes in score

Day 1



Day 2



Day 3



The more suggestion is ignored the more the score increases, increasing it appearing in the suggestion bar

For example

50%

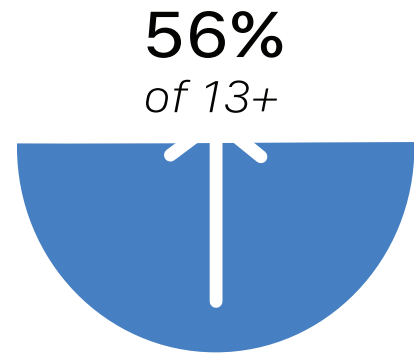
20%

frequency of use

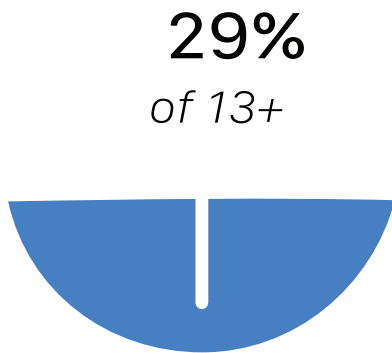
50% frequency of use

20%

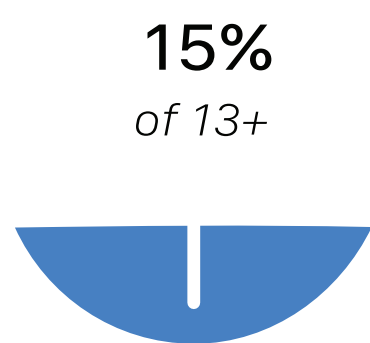
Statistics of Americans That Use Predictive Text and their Comfortability



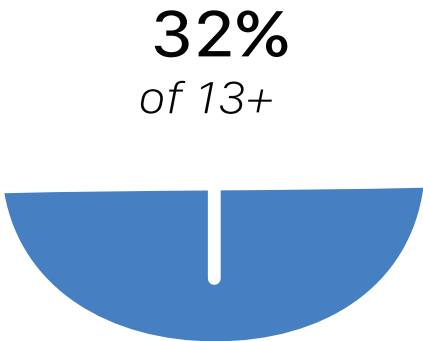
Don't use predictive text
very often



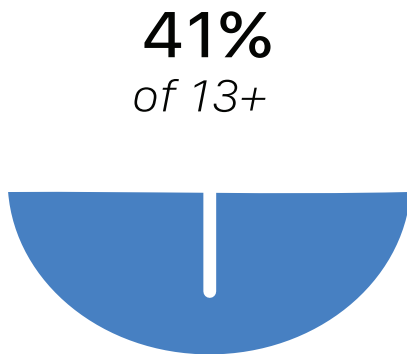
Use predictive text somewhat often



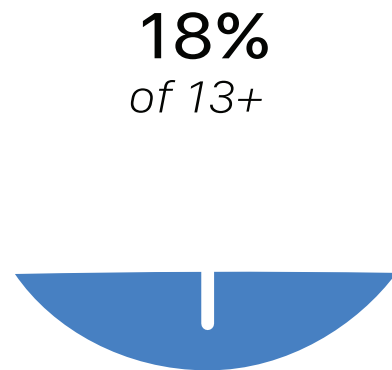
Use predictive text
very often



Not comfortable with predictive text
predicting and finishing their senteces



Somewhat comfortable with predictive text
predicting and finishing their senteces



Very comfortable with predictive text
predicting and finishing their senteces