

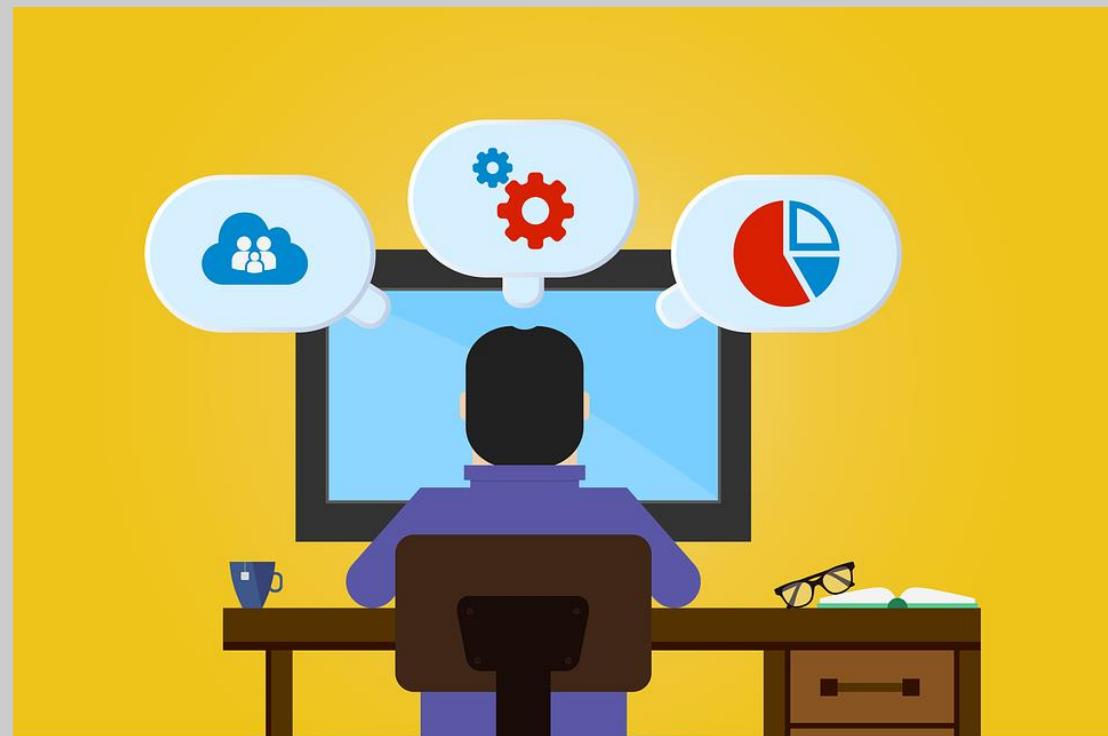
INGLÊS

Learning to read:
**Estratégias para Leitura de
Textos em Inglês**

LEARNING TO READ: ESTRATÉGIAS PARA LEITURA DE TEXTOS EM INGLÊS

OBJECTIVE:

**Use computer programs
to explore texts.**



Using digital technology to enhance formative assessment in mathematics classrooms

Diane Dalby and Malcolm Swan

Diane Dalby is a senior research fellow at the University of Nottingham. Her main research interests are in post-16 mathematics policy and practice within Further Education. Malcolm Swan was professor and Head of the Centre for Research in Mathematics Education at the University of Nottingham at the time of this research. He is still widely known internationally for his design research work with mathematics tasks and assessments. Address for correspondence: Diane Dalby, School of Education, University of Nottingham, Jubilee Campus, Wollaton Road, Nottingham NG8 1BB, United Kingdom. Email: diane.dalby@nottingham.ac.uk

Abstract

In this paper, which is based on research from the EU-funded project Improving Progress through Formative Assessment in Science and Mathematics Education, we explore how iPads are used within formative assessment processes by six mathematics teachers and their classes in two secondary comprehensive schools in the Midlands of England. A design research approach is first used to develop and trial six lessons in which iPads are used in different ways within formative assessment processes. Through lesson observations, video analysis and teacher interviews we then examine how iPad technology contributes to these processes, the functions it performs and the distribution of activity between the main actors (teacher, technology and student). An analytic approach is developed which captures the interactions in visual representations, showing how the technology is often used as a form of communication but also performs more active functions which affect the role taken by the teacher in formative processes. The study offers insight into ways in which iPad technology contributes to effective student learning through formative assessment and introduces an analytic approach that may be useful for further studies.

Introduction

The technological developments of the last few decades have undoubtedly prompted a cultural revolution affecting our social habits, communication and work procedures (Vander Ark, 2011). In particular, the expansion of digital technology has led to a proliferation of static and hand-held devices with networking and information sharing capacities. A significant impact on education might be anticipated from this technological revolution (Yang, 2013), particularly when learning is viewed as a socially situated practice, since digital technology provides new methods of communication and social interaction. The adoption of technology within the classroom does however fall short of expectations (Fullan & Donnelly, 2013; Livingstone, 2012; OECD, 2008) and pedagogical adjustments by teachers to the rapid changes in technology seem to proceed slowly. This apparent reluctance on the part of teachers may be attributed partially to external constraining factors (Hennessy, Ruthven, & Brindley, 2005; Yang, 2013) and the slowness of system change (Fullan & Donnelly, 2013) but raises questions about whether evidence of the benefits to student

The image shows a screenshot of Laurence Anthony's website. At the top, there is a navigation bar with links: Home, Resume, Publications ▾, Software ▾, Classes, Photo Albums ▾, Links, and Contact. Below the navigation bar, the page title "AntConc Homepage" is displayed. Underneath it, the heading "Latest Release" is shown. To the left of the text, there is a cartoon illustration of a black ant standing on top of a blue book. The main content area contains the following text:

AntConc
A freeware corpus analysis toolkit for concordancing and text analysis.

[AntConc Homepage] [Screenshots] [Help] [License]

Downloads:

- Windows (3.5.8)
- Windows 64-bit (3.5.8)
- Macintosh OS X 10.6-10.12 (3.5.8)
- Linux 32-bit (3.5.8)
- Linux 64-bit (3.5.8)
- Older versions

PayPal Donations and Patreon Supporters:

Click one of the following if you want to make a small donation to support the future development of this tool.

[Support this tool](#)

To the right of the homepage content, there is a screenshot of the AntConc software interface. The window title is "AntConc 3.5.0 [Windows] 2017". The main pane displays a concordance list for the word "word". The list shows 279 hits, with the first few entries being:

- 1 J650 absorbed from the written word. A fundamental source of BROWN1_A
- 2 out of it with eclat. in a word a man who creates G50 1: BROWN1_G
- 3 to make it apply to the wrong word. A verse R05 0460 familial BROWN1_R,
- 4 40 0950 of never having read a word about art, but there was n BROWN1_A
- 5 odyte forever. She never said a word about the fifty dollars. K18 BROWN1_K,
- 6 usual one digit or two-digit index word address in the range J69 1 BROWN1_J.
- 7 light J69 1890 or two-digit index word address in the range 3-94. BROWN1_J.
- 8 nabled by C14 0840 putting one word after another. M&S sansor BROWN1_C
- 9 he Sioux, refused to say a harsh word against him. F22 1770 He BROWN1_F,
- 10 light lead to devices like a 5000-word alphabetical dictionary J3 BROWN1_J.
- 11 I owe it all to them>. The word also K07 0520 made him BROWN1_K.
- 12 116 1150 you, he who hears my word, and believes him who ser BROWN1_D
- 13 uses to symbolic J69 0280 index word and electron switch nam BROWN1_J.
- 14 English sentence and the Martian word and felt closer grokking. M BROWN1_M

The software interface includes various toolbars and menus at the top, and several search and filter options at the bottom.

AntConc 3.5.8 (Windows) 2019

File Global Settings Tool Preferences Help

Corpus Files

Concordance Concordance Plot File View Clusters/N-Grams Collocates Word List Keyword List

Concordance Hits 0

Hit KWIC File

Total No. 0

Files Processed

Search Term Words Case Regex

Advanced

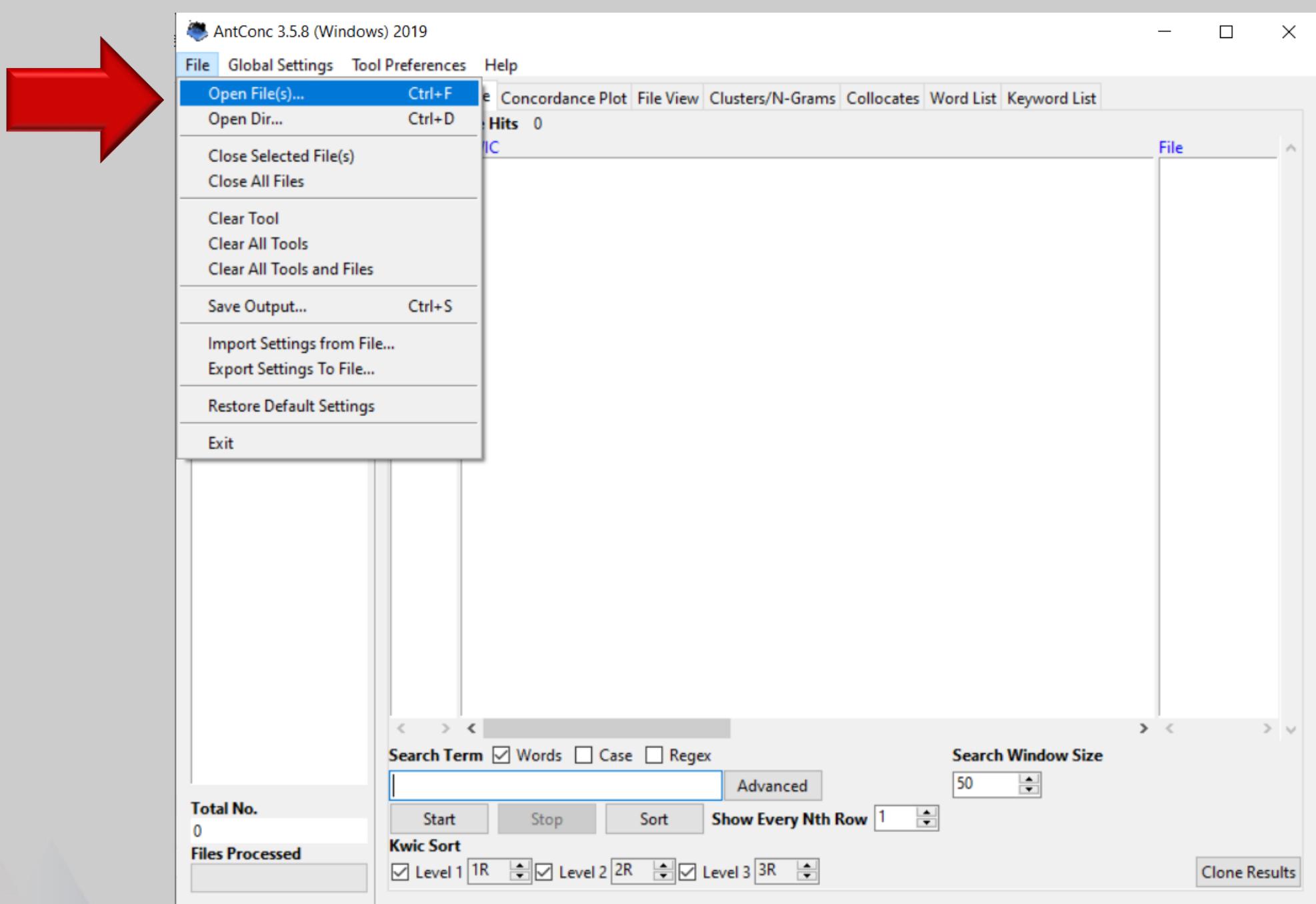
Search Window Size 50

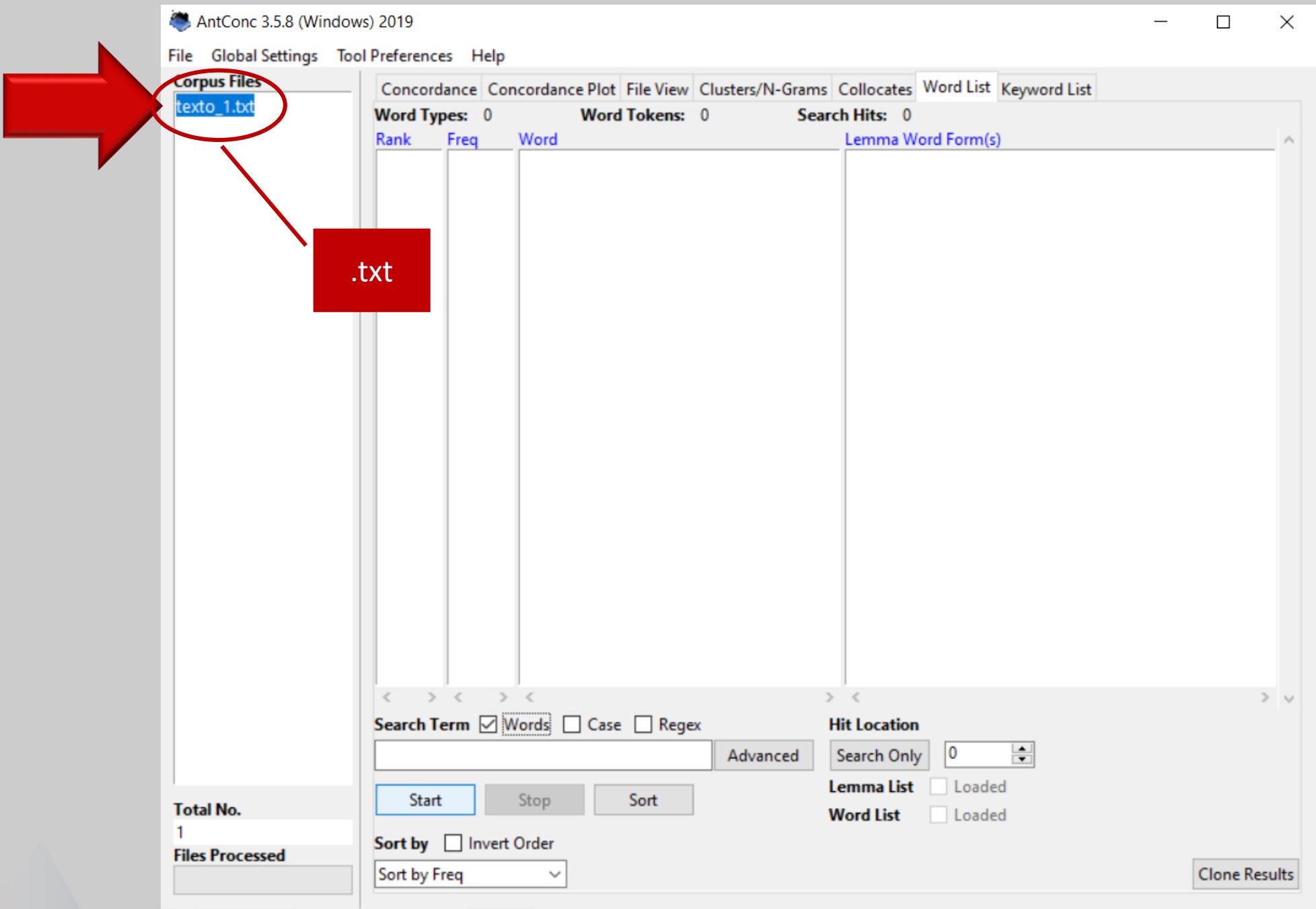
Start Stop Sort Show Every Nth Row 1

Kwic Sort Level 1 1R Level 2 2R Level 3 3R

Clone Results

This screenshot shows the AntConc 3.5.8 software interface. The window title is 'AntConc 3.5.8 (Windows) 2019'. The menu bar includes 'File', 'Global Settings', 'Tool Preferences', and 'Help'. A 'Corpus Files' sidebar on the left lists 'Total No.' as 0 and 'Files Processed' as empty. The main panel is titled 'Concordance' and contains tabs for 'Concordance', 'Concordance Plot', 'File View', 'Clusters/N-Grams', 'Collocates', 'Word List', and 'Keyword List'. Below the tabs, it says 'Concordance Hits 0'. The 'KWIC' tab is selected, showing a table with columns 'Hit' and 'File'. At the bottom of the panel are search and sort controls: 'Search Term' with checkboxes for 'Words', 'Case', and 'Regex', an 'Advanced' button, 'Search Window Size' set to 50, 'Start', 'Stop', 'Sort', 'Show Every Nth Row' (set to 1), 'Kwic Sort' with checkboxes for 'Level 1', 'Level 2', and 'Level 3', and a 'Clone Results' button.





AntConc 3.5.8 (Windows) 2019

File Global Settings Tool Preferences Help

Corpus Files
texto_1.txt

Concordance Concordance Plot File View Clusters/N-Grams Collocates Word List Keyword List

Word Types: 1257 Word Tokens: 6668 Search Hits: 0

Rank	Freq	Word
1	400	the
2	258	of
3	236	and
4	172	in
5	166	to
6	153	technology
7	112	a
8	95	formative
9	94	assessment
10	87	x
11	81	teacher
12	67	is
13	66	for
14	64	student
15	61	learning
16	60	processes
17	55	students
18	55	this

Lemma Word Form(s)

Search Term Words Case Regex

Advanced Hit Location

Start Stop Sort

Search Only 0

Lemma List Loaded

Word List Loaded

Files Processed

Sort by Invert Order

Sort by Freq

Clone Results

A large red arrow points from the bottom left towards the 'Files Processed' bar. A second red arrow points from the bottom left towards the 'Start' button. A third red arrow points downwards from the top right towards the 'Word List' tab.

AntConc 3.5.8 (Windows) 2019

File Global Settings Tool Preferences Help

Corpus Files

texto_1.txt

Concordance Concordance Plot File View Clusters/N-Grams Collocates Word List Keyword List

Concordance Hits 153

Hit KWIC

1 British Journal of Educational Technology Vol 50 No 2 2019 832\x95 texto_1.txt
i:10.1111/bjet.12606 Using digital technology to enhance formative assessments we then examine how iPad technology contributes to these representations between the main actors (teacher, technology and student). An analytical insight into ways in which iPad technology contributes to effective particular, the expansion of digital technology has led to a proliferative socially situated practice, since digital technology provides new methods of social interaction. The adoption of technology within the classroom does not seem to proceed slowly at a better understanding of how technology contributes to effective research Association Using digital technology in formative assessment. \x95 The extent to which technology is used in classrooms benefits to student learning of using technology are often unclear to teachers adds \x95 Specific functions of technology in formative assessment need that captures the interaction of technology, teacher and students in of interaction between teacher and technology are identified where applicable.

File

< > < > < > < >

Search Term Words Case Regex

technology Advanced

Search Window Size 50

Total No. 1

Files Processed

Kwic Sort Level 1 1R Level 2 2R Level 3 3R

Clone Results

↓

File Global Settings Tool Preferences Help

Corpus Files

Concordance Plot File View Clusters/N-Grams Collocates Word List Keyword List

Concordance Hits 153

Hit	KWIC	File
95	tracking. This suggests that iPad technology might perform some useful functions w	texto_1.txt
96	between teacher and student. The technology might also process the students\x92	texto_1.txt
97	aking the contribution of the iPad technology more significant, changing the role of	texto_1.txt
98	further research into the effects of technology on student learning and as a	texto_1.txt
99	i, M. (2012). The impact of digital technology on learning: a summary for the	texto_1.txt
100	hnologies.pdf Loveless, A. (2011). Technology, pedagogy and education: reflections on	texto_1.txt
101	and believe in a digital age. Technology, Pedagogy and Education, 20, 301\x9631	texto_1.txt
102	s: \x95 What functions does iPad technology perform in formative assessment? \x95	texto_1.txt
103	cially situated practice, since digital technology provides new methods of communicatio	texto_1.txt
104	; Mishra & Koehler, 2006). Digital technology provides tools, that may enable or	texto_1.txt
105	by the teacher and the iPad technology provides a means of communication bet	texto_1.txt
106	tess. In Example 2 (Figure 4), the technology provides an overview of the class	texto_1.txt
107	ctive response systems, where the technology provides formative feedback and adaptiv	texto_1.txt
108	n our third example, however, the technology provides additional functions	texto_1.txt
109	examples of the use of iPad technology require pedagogical changes	texto_1.txt
110	teachers to the rapid changes in technology seem to proceed slowly. Thi	texto_1.txt
111	nteractions between teachers, iPad technology, students and peers. This then facilitated	texto_1.txt
112	; Example 3 (Figure 5), shows the technology taking a more active role in	texto_1.txt
113	ed that captures the interaction of technology, teacher and students in formative proce	texto_1.txt

Search Term Words Case Regex

Search Window Size 50

technology Advanced

Total No. 1

Files Processed

Kwic Sort Level 1 1R Level 2 2R Level 3 3R

Clone Results

PADRÃO

AntConc 3.5.8 (Windows) 2019

File Global Settings Tool Preferences Help

Corpus Files

texto_1.txt

Concordance Concordance Plot File View Clusters/N-Grams Collocates Word List Keyword List

Total No. of N-Gram Types 10202 Total No. of N-Gram Tokens 13333

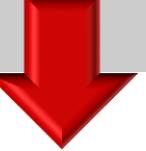
Rank	Freq	Range	N-gram
1	74	1	formative assessment
2	65	1	of the
3	36	1	in the
4	35	1	ipad technology
5	31	1	the teacher
6	30	1	to the
7	26	1	assessment processes
8	26	1	technology in
9	26	1	the technology
10	25	1	formative assessment processes
11	24	1	and the
12	21	1	student learning
13	19	1	digital technology
14	19	1	in formative
15	16	1	educational research
16	16	1	in formative assessment
17	15	1	by the

Search Term Words Case RegEx N-Grams Advanced N-Gram Size Min. 2 Max. 3

Start Stop Sort Total No. 1 Files Processed

Sort by Invert Order Search Term Position Sort by Freq On Left On Right

Min. Freq. 1 Min. Range 1 Clone Results



File Global Settings Tool Preferences Help

Open File(s)... Ctrl+F
Open Dir... Ctrl+D

Close Selected File(s)
Close All Files

Clear Tool
Clear All Tools
Clear All Tools and Files

Save Output... Ctrl+S

Import Settings from File...
Export Settings To File...

Restore Default Settings

Exit

w_academic_articles_b
w_academic_articles_b
w_academic_articles_b
w_academic_articles_b
w_academic_articles_b

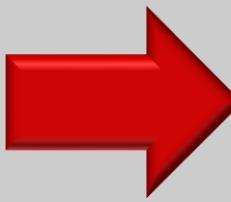
Search Term Words Case Regex N-Grams **N-Gram Size**
Min. 3 Max. 3

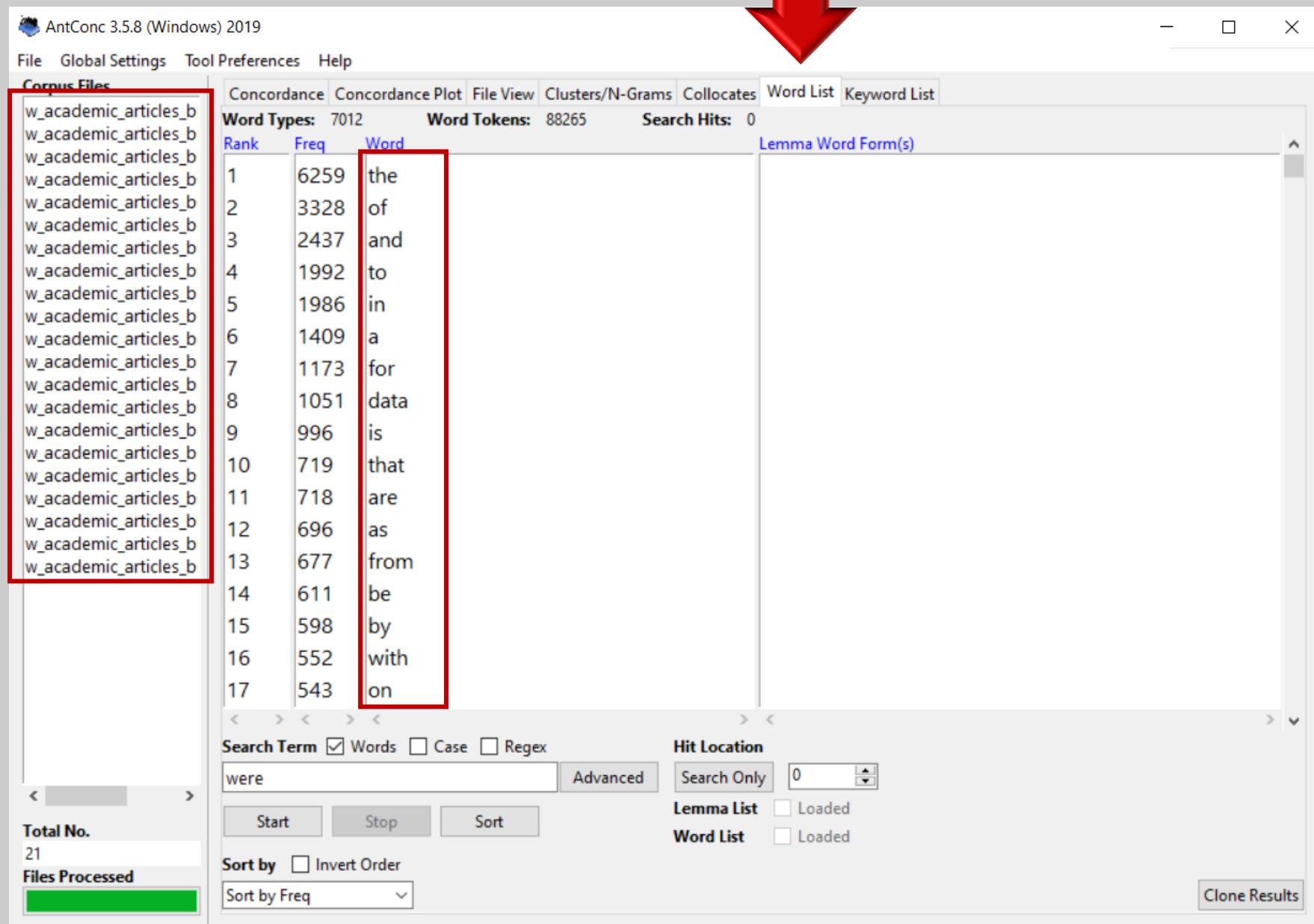
Start Stop Sort

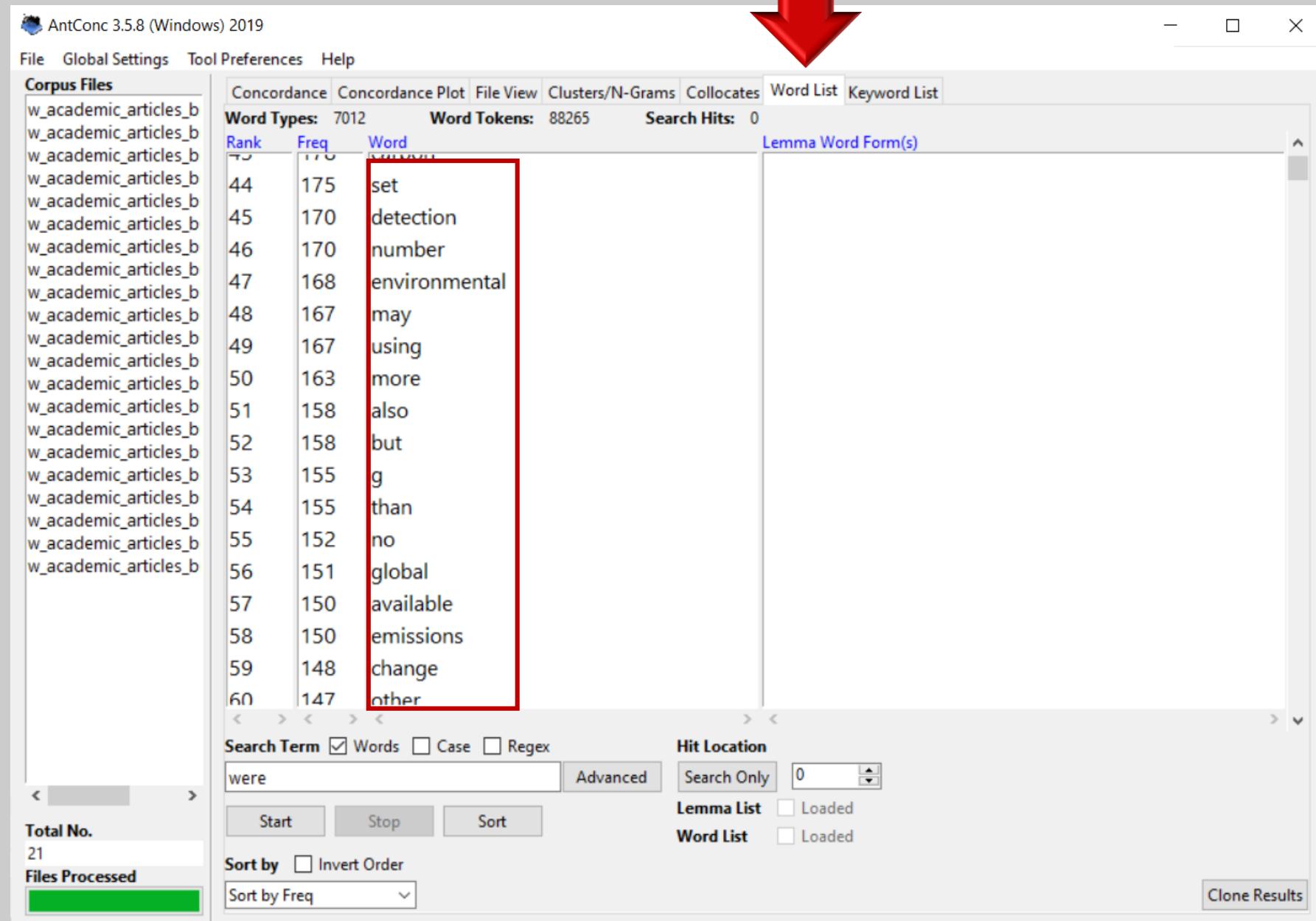
Total No. 21 **Files Processed**

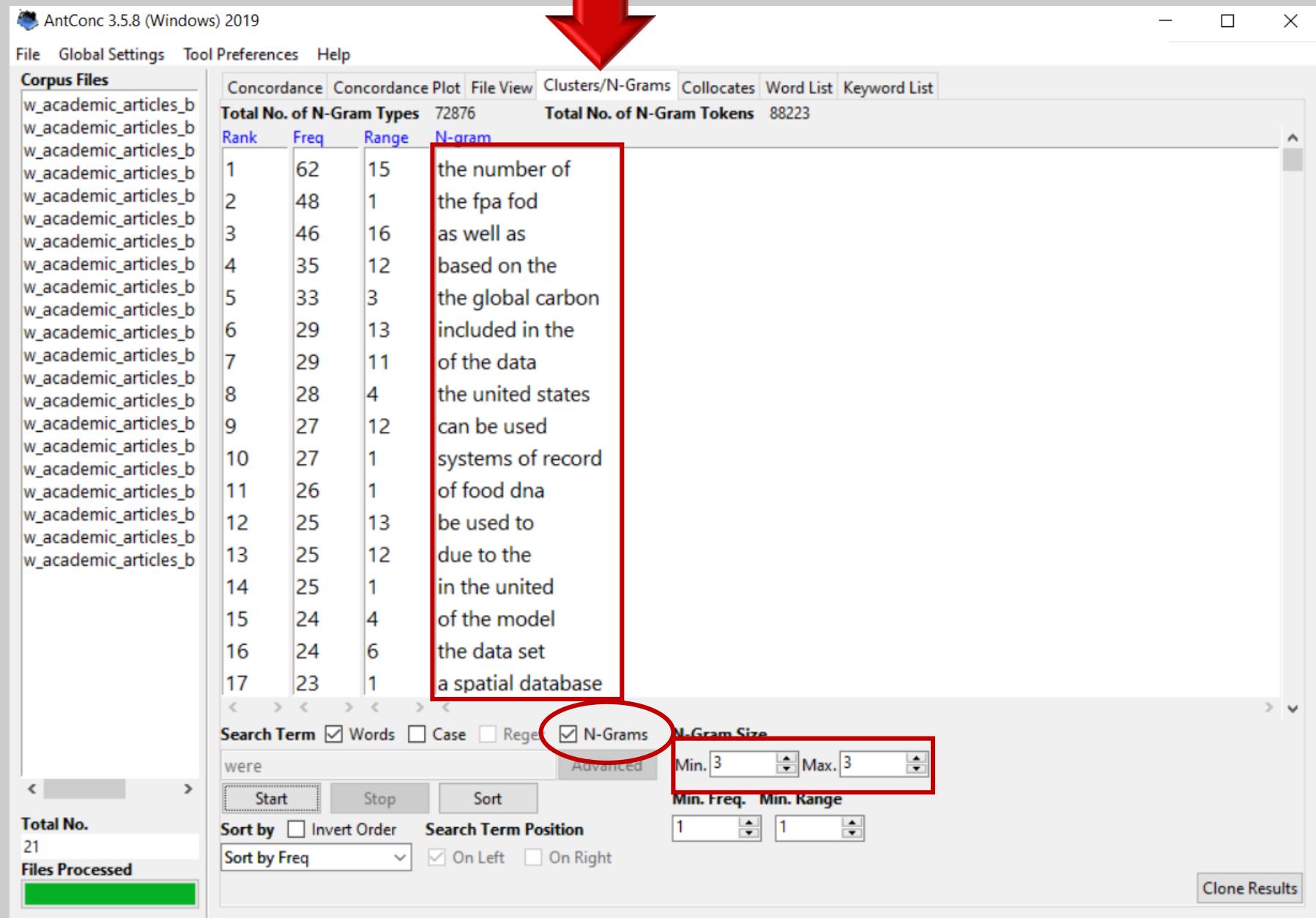
Sort by Invert Order **Search Term Position** **Min. Freq. Min. Range**
Sort by Word End On Left On Right 1 1

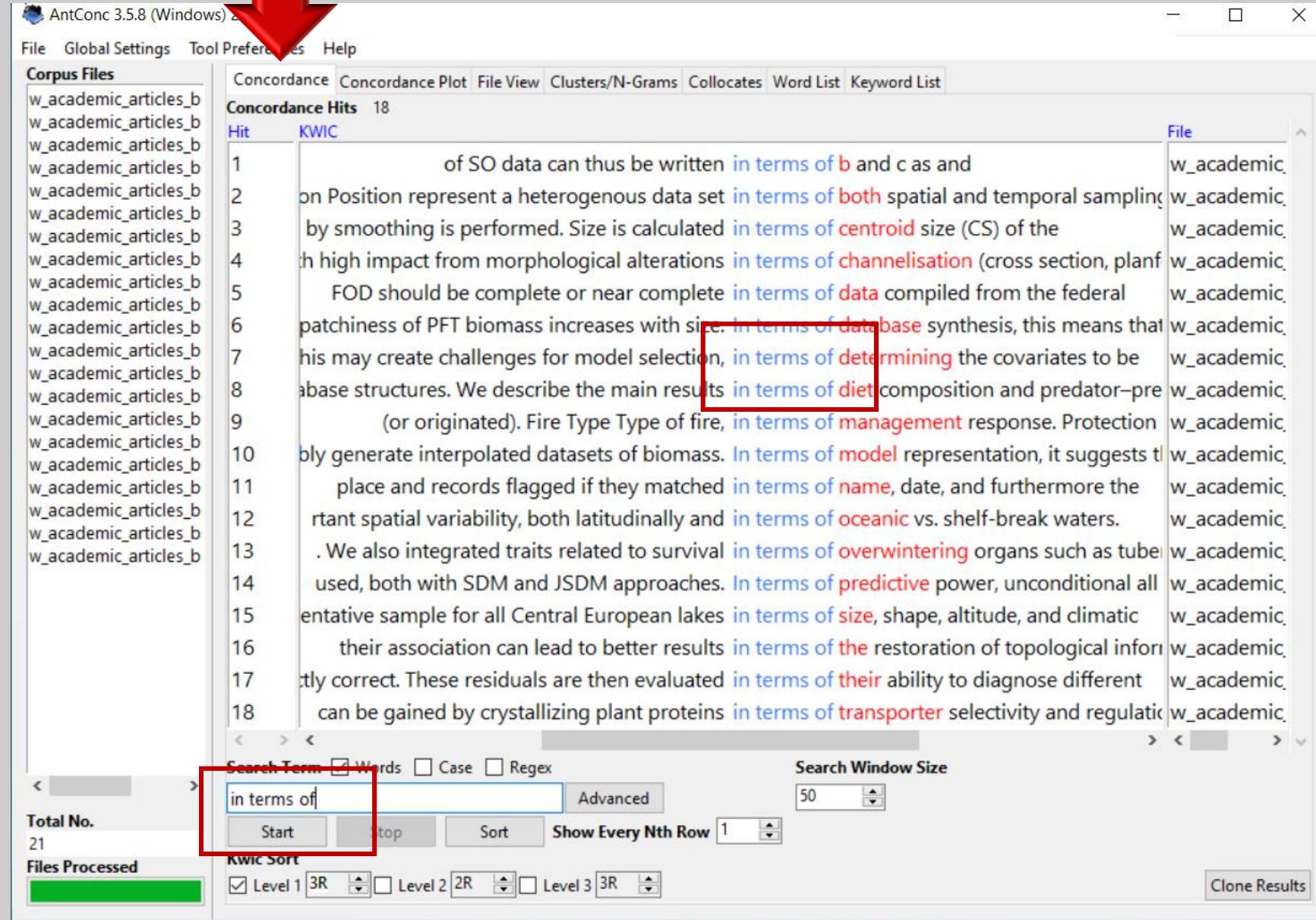
Clone Results

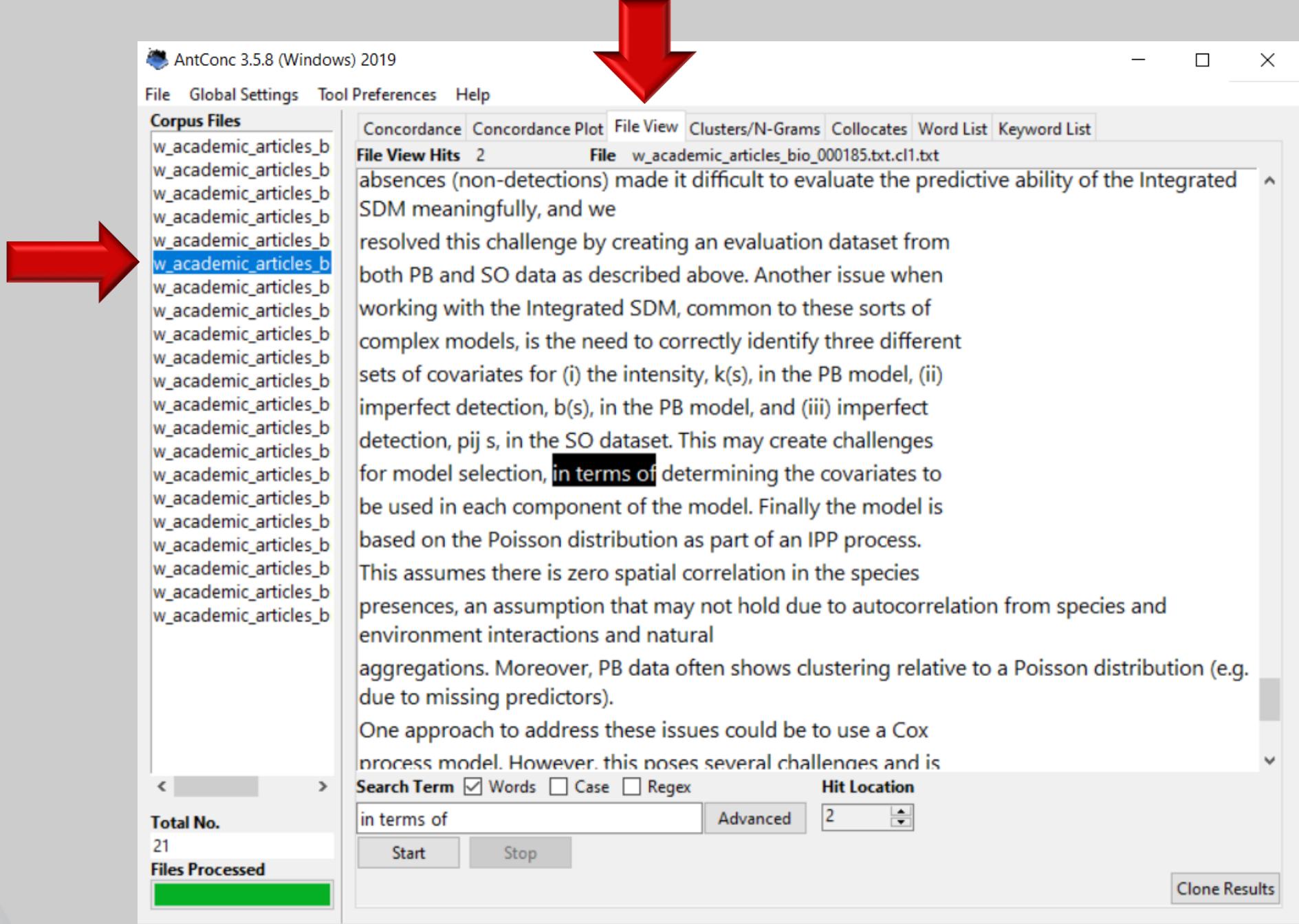


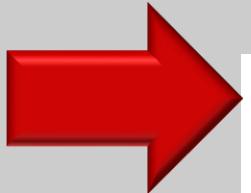






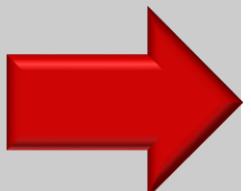






Video tutorials

- YouTube Tutorials (by Laurence Anthony)
 - [11-part series \(Version 3.4.0\)](#)
 - [10-part series \(Version 3.2.4\)](#)
- YouTube Tutorials (by Monika Bednarek)
 - [6-part series \(Version 3.2.0\)](#)
- YouTube Tutorials (by Hyun Jung)
 - [8-part series \(Version 3.2.0\)](#)
- YouTube Tutorials (by Umair Ibne Abid of Umair Linguistics)
 - [13-part series \(English\) \(Version 3.5.7\)](#)
 - [13-part series \(Urdu/Hindi\)\(Version 3.5.7\)](#)
- Youku Tutorials (by Laurence Anthony)
 - [Getting Started \(Version 3.2.0\)](#)
 - [Concordance Tool - Basic Features \(Version 3.2.0\)](#)



Downloadable guides

- Guide by Warren Tang (Hiroshima University, Japan)
 - [AntConc 3.2.1 Tutorial \(in English\)](#) Latest version available [here](#).

LEARNING TO READ: *ESTRATÉGIAS PARA LEITURA DE TEXTOS EM INGLÊS*

AntConc can help you:

- ✓ **Explore text / texts / kinds of texts**
- ✓ **Find patterns (*in terms of*)**