**Information Fluency Continuum Stages of Inquiry**

**Connect**

**Wonder**

CC.9-10.W.7 Research to Build and Present Knowledge: Conduct short as well **as more sustained research projects** to answer a question (including a self-generated question) or **solve a problem**; narrow or broaden **the inquiry** when appropriate; **synthesize multiple sources on the subject,** **demonstrating understanding of the subject under investigation.**

**Investigate**

CC.9-10.W.7 Research to Build and Present Knowledge: Conduct short as well **as more sustained research projects** to answer a question (including a self-generated question) or **solve a problem**; narrow or broaden **the inquiry** when appropriate; **synthesize multiple sources on the subject,** **demonstrating understanding of the subject under investigation.**

CC.9-10.W.8 Research to Build and Present Knowledge: Gather relevant information from multiple **authoritative** print and digital sources, using **advanced searches** effectively; assess the usefulness of each source in answering the research question; **integrate information into the text selectively to maintain the flow of ideas,** avoiding plagiarism and following a standard format for citation.

**Construct**

**CC.9-10.SL.2** Comprehension and Collaboration:

Integrate multiple sources of information presented in diverse media or formats (e.g., visually, quantitatively, orally) evaluating the credibility and accuracy of each source.

CC.9-10.W.8 Research to Build and Present Knowledge: Gather relevant information from multiple **authoritative** print and digital sources, using **advanced searches** effectively; assess the usefulness of each source in answering the research question; **integrate information into the text selectively to maintain the flow of ideas,** avoiding plagiarism and following a standard format for citation.

**Express**

CC.9-10.W.6 Production and Distribution of Writing: Use technology, including the Internet, to produce, publish, and update individual or shared writing products, **taking advantage of technology's capacity to link to other information and to display information flexibly and dynamically.**

**Reflect**

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| **Common Core Standards ELA Grade 9-10** | **Specific Information Literacy Skill Breakdown AND Library Tools Applications** | **Content Specific Vocabulary** | |
| **CC.9-10.SL.2** Comprehension and Collaboration:  Integrate multiple sources of information presented in diverse media or formats (e.g., visually, quantitatively, orally) evaluating the credibility and accuracy of each source. | 1. Effectively locate a variety of print and digital resources *(VRC, NoodleTools Bibliography source analysis tool)* 2. Search the internet effectively *(Google Advanced)* 3. Use filters effectively *(VRC, advanced search)* 4. Revise search strategies 5. Evaluate the credibility and accuracy of sources *(NT Annotations)*   *NT Notecards/Google Drive:*   1. Integrate surveys, polls, interviews into product 2. Integrate charts, tables and diagrams into product 3. Integrate photographs into product 4. Create products in diverse media formats based on rhetorical purpose | attribution  avatar  bias  Boolean  call numbers  cell  Copyright/Digital Ethics  Creative Commons  databases  digital moviemaking  disinformation  document design  embed  filter  OPAC  transmedia  Fair Use | font  full-text  hashtag  infographics  netcast  podcast  PowerPoint  spreadsheet  Search Engine tools  streaming video  wiki  Web 2.0 tools widget  video blog  JPEG, GIF, TIFF  web browser |

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| **Common Core Standards ELA Grade 9-10** | **Specific Information Literacy Skill Breakdown AND Library Tools Applications** | **Content Specific Vocabulary** |
| CC.9-10.W.6 Production and Distribution of Writing: Use technology, including the Internet, to produce, publish, and update individual or shared writing products, **taking advantage of technology's capacity to link to other information and to display information flexibly and dynamically.** | 1. Load and upload documents/files 2. Effectively use word processing applications *(NT notecards/ GoogleDocs)* 3. Determine and effectively use the best publishing tool 4. Link to and cite sources *(NT notecards)* 5. Compose and share documents collaboratively using technology tools *(NT share options/ Google Drive)* 6. Understand basic elements of document design 7. Tag, comment, annotate, subscribe digitally *(NT notecards/VRC databases)* | blogs  blooks  cloud  curate  digital footprint  file sharing  embed  Intellectual property  bookmark  Geotagging  App  Microblog (Twitter, tweet, retweet)  Google Docs  hyperlink  pathfinder  profile  public domain  RSS feed  asynchronous  synchronous  tag  wiki  subscribe  open source software (Wikipedia)  social media  social networking |

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| **Common Core Standards ELA Grade 9-10** | **Specific Information Literacy Skill Breakdown AND Library Tools Applications** | **Content Specific Vocabulary** |
| CC.9-10.W.7 Research to Build and Present Knowledge: Conduct short as well **as more sustained research projects** to answer a question (including a self-generated question) or **solve a problem**; narrow or broaden **the inquiry** when appropriate; **synthesize multiple sources on the subject,** **demonstrating understanding of the subject under investigation.** | 1. Formulate questions *(NT Topic/Thesis area)* 2. Determine and effectively locate a variety of resources *(NT Bibliography)* 3. Revise search strategies (*(NT Bibliography analysis tool)* 4. Use databases, websites, social media, books, visuals 5. Evaluate sources *(NT Bibliography)* 6. Formulate answers (NT Notecards) 7. Synthesize information *(NT Notecards and Outline)* 8. Compose summaries *(Google Drive)* 9. Report findings *(Google Drive)* 10. Reflect on the path and process 11. Generate “conclusions” 12. Determine next steps | electronic graphic organizer  gateway source  journal  keyword search  OPAC  peer-reviewed  periodical  primary source  query  reference  research in “real-time”  secondary source  subject headings  subject search |

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| **Common Core Standards ELA Grade 9-10** | **Specific Information Literacy Skill Breakdown AND Library Tools Applications** | **Content Specific Vocabulary** |
| CC.9-10.W.8 Research to Build and Present Knowledge: Gather relevant information from multiple **authoritative** print and digital sources, using **advanced searches** effectively; assess the usefulness of each source in answering the research question; **integrate information into the text selectively to maintain the flow of ideas,** avoiding plagiarism and following a standard format for citation. | 1. Effectively locate a variety of resources *(VRC, library, Internet)* 2. Revise search strategies 3. Use advanced search features *(VRC, Internet)* 4. Apply database and internet filters such as keyword, subject, “search within” publication search, advanced search, Boolean, related searches, document type, date *(VRC databases, Internet)* 5. Determine credibility/ accuracy of a source *(NT Bibliography annotation section)* 6. Understand purpose for using primary/secondary sources 7. Know *how* to incorporate primary and secondary sources 8. Understand purpose of citation (MLA and APA) 9. Incorporate parenthetical citation (paraphrase and quotation) using signal phrases where appropriate *(NT Notecards)* 10. Create Works Cited page *(NT Bibliography)* | Advanced search  citing sources  footnote  gateway source  keyword search  libel  OPAC  page rank  paraphrasing  parenthetical citation  plagiarism  primary source  quoting  research in “real-time”  scholarly  secondary source  signal phrase  slander  subject headings  subject search  summarizing |

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| **Common Core Standards ELA Grade 11-12** | **Specific Library Information Literacy Skill Breakdown** |  | |
| CC.11-12.R.I.7 Integration of Knowledge and Ideas: Integrate and evaluate multiple sources of information presented in different media or formats (e.g., visually, quantitatively) as well as in words in order to address a question or solve a problem. | 1. Effectively locate a variety of resources 2. Revise search strategies 3. Evaluate the credibility and accuracy of sources 4. Integrate primary and secondary sources surveys, polls, interviews 5. Integrate charts, tables and diagrams 6. Integrate photographs |  |  |
| CC.11-12.SL.2 Comprehension and Collaboration: Integrate multiple sources of information presented in diverse formats and media (e.g., visually, quantitatively, orally) in order to make informed decisions and solve problems, evaluating the credibility and accuracy of each source and noting any discrepancies among the data. | 1. Locate diverse print and non-print sources 2. Evaluate the credibility and accuracy of sources 3. Integrate surveys, polls, interviews 4. Integrate charts, tables and diagrams 5. Integrate photographs 6. Understand advantages and disadvantages of each source type |  |  |
| CC.11-12.W.6 Production and Distribution of Writing: Use technology, including the Internet, to produce, publish, and update individual or shared writing products in response to ongoing feedback, including new arguments or information. | 1. Search effectively using advanced search tools including filters 2. Load and upload documents/files 3. Determine and effectively use the best dynamic publishing tool 4. Compose and share documents collaboratively 5. Understand the conventions of writing digitally, including the role of visual rhetoric document design and typography 6. Link to and cite sources |  |  |
| CC.11-12.W.7 Research to Build and Present Knowledge: Conduct short as well as more sustained research projects to answer a question (including a self-generated question) or solve a problem; narrow or broaden the inquiry when appropriate; synthesize multiple sources on the subject, demonstrating understanding of the subject under investigation. | 1. Formulate questions and determine appropriate resources 2. Effectively locate a variety of resources 3. Revise search strategies 4. Use databases, websites, social media, books, visuals 5. Tag, comment, annotate, subscribe digitally 6. Evaluate sources 7. Formulate answers, synthesize information, compose summaries 8. Reflect on the path and process 9. Generate “conclusions” 10. Compose summaries 11. Report findings 12. Determine next steps |  |  |
| CC.11-12.W.8 Research to Build and Present Knowledge: Gather relevant information from multiple authoritative print and digital sources, using advanced searches effectively; assess the **strengths and limitations** of each source **in terms of the task, purpose, and audience**; integrate information into the text selectively to maintain the flow of ideas, avoiding plagiarism and overreliance on any one source and following a standard format for citation. | 1. Use the Deep Web, subject guides, and alternative internet research pathways 2. Use advanced search features and apply database and internet filters such as keyword, subject, “search within” publication search, Boolean logic, document type, date 3. Select a variety of primary and secondary sources and visuals from various locations 4. Determine strengths and weaknesses of source by rhetorical purpose 5. Determine credibility/ accuracy of a source 6. Understand the purpose of citation (MLA and APA) and create Works Cited Page 7. Differentiate between summary, paraphrase, and quotation and incorporate into writing 8. Stylistically incorporate parenthetical citation (paraphrase and quotation) and signal phrases |  |  |

**The Ethical Researcher: Phases of Notetaking**

**Mapping Information Literacy: Notetaking Phases**

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| **INFORMATION LITERACY: A PROBLEM SOLVING PROCESS** | |  | **Grade 9** | **Grade 10** | **Grade 11** | **Grade 12** |
| Connect | UNDERSTANDING THE CONTEXT | Phase 1  Prepare  for note  taking |  |  |  |  |
| BROWSING  GRAZING |  |  |  |  |
| Wonder | DEFINING A NEED  STATING A GOAL  FORMING A FOCUS  ASKING A QUESTION |  |  |  |  |
| Investigate | IDENTIFYING LIKELY SOURCES  DESIGNING A SEARCH STRATEGY | Phase 2  Organize  for note  taking |  |  |  |  |
| LOCATING RESOURCES |  |  |  |  |
| Construct | ASSESSING APPROPRIATENESS TO  TASK  IDENTIFYING MISSING INFORMATION |  |  |  |  |
| REVISING SEARCH STRATEGY |  |  |  |  |
| COMPREHENDING THE INFORMATION | Phase 3  Design  and use  notes as  thinking  tools |  |  |  |  |
| RECORDING INFORMATION |  |  |  |  |
| ORGANIZING INFORMATION |  |  |  |  |
| INTERPRETING INFORMATION  COMPARING, JUDGING, ANALYZING |  |  |  |  |
| SYNTHESIZING A POSITION  DEVELOPING A POINT OF VIEW  FORMING A CONCLUSION |  |  |  |  |
| Express | COMMUNICATING THE INFORMATION |  |  |  |  |
| Reflect | SELF-EVALUATION OF PROCESS | Phase 4  Assess  note  taking |  |  |  |  |
| SELF-EVALUATION OF PRODUCT |  |  |  |  |
| **The Ethical Researcher: Phases of Outlining**  **Mapping Information Literacy: Outlining Phases** | | | | | | |
|  | **INFORMATION LITERACY: A PROBLEM SOLVING PROCESS** |  | **Grade 9** | **Grade 10** | **Grade 11** | **Grade 12** |
| Construct | Creating topics and subtopics | Phase 1  Organize |  |  |  |  |
| Structuring topics and subtopics for best rhetorical Impact |  |  |  |  |
| Inserting paraphrases and quotations | Phase 2  Build Argument |  |  |  |  |
| Show relationship between ideas |  |  |  |  |
| Examine strength of argument/organization |  |  |  |  |
| Check developments in your work | Phase 3  Evaluate and Understand |  |  |  |  |
| Identifying missing information |  |  |  |  |
| Understand minor and major points |  |  |  |  |
| Interpret information:  Comparing, Judging, Analyzing |  |  |  |  |
| Express | Communicating the Information | Phase 4  Present |  |  |  |  |
| Reflect | SELF-EVALUATION OF PROCESS | Phase 5  Reflect |  |  |  |  |
| SELF-EVALUATION OF PRODUCT |  |  |  |  |

**OTHER Common Core Skills Facilitated by NoodleTools**Integrated tools for **note-taking**, **outlining**, **citation**, **document archiving/annotation**, and **collaborative research and writing**.

* Evaluating Sources (graphs analyze quantity, variety and currency of sources.)
* Balancing Sources
* Ethical use of sources
* Paraphrasing vs. quoting
* Use of original thinking
* Proper attribution
* Understanding variations in citation styles
* Parenthetical reference
* “Tagging” notecards/ understanding how and why to tag; generate organizational “schema”
* Understanding Research Question and “Working Thesis”
* Revising Thesis
* Prioritizing aspects of research
* Scheduling a research project/adhering to deadlines
* Collaborating on research (all stages)
* Sharing work with teacher
* Easily offering student feedback to guide reflection and next steps