

From Topic to Literature Review

Inês Faria

05/03/2024, 18:00-19:30

FRANCESINHAS 2, Room 2.03

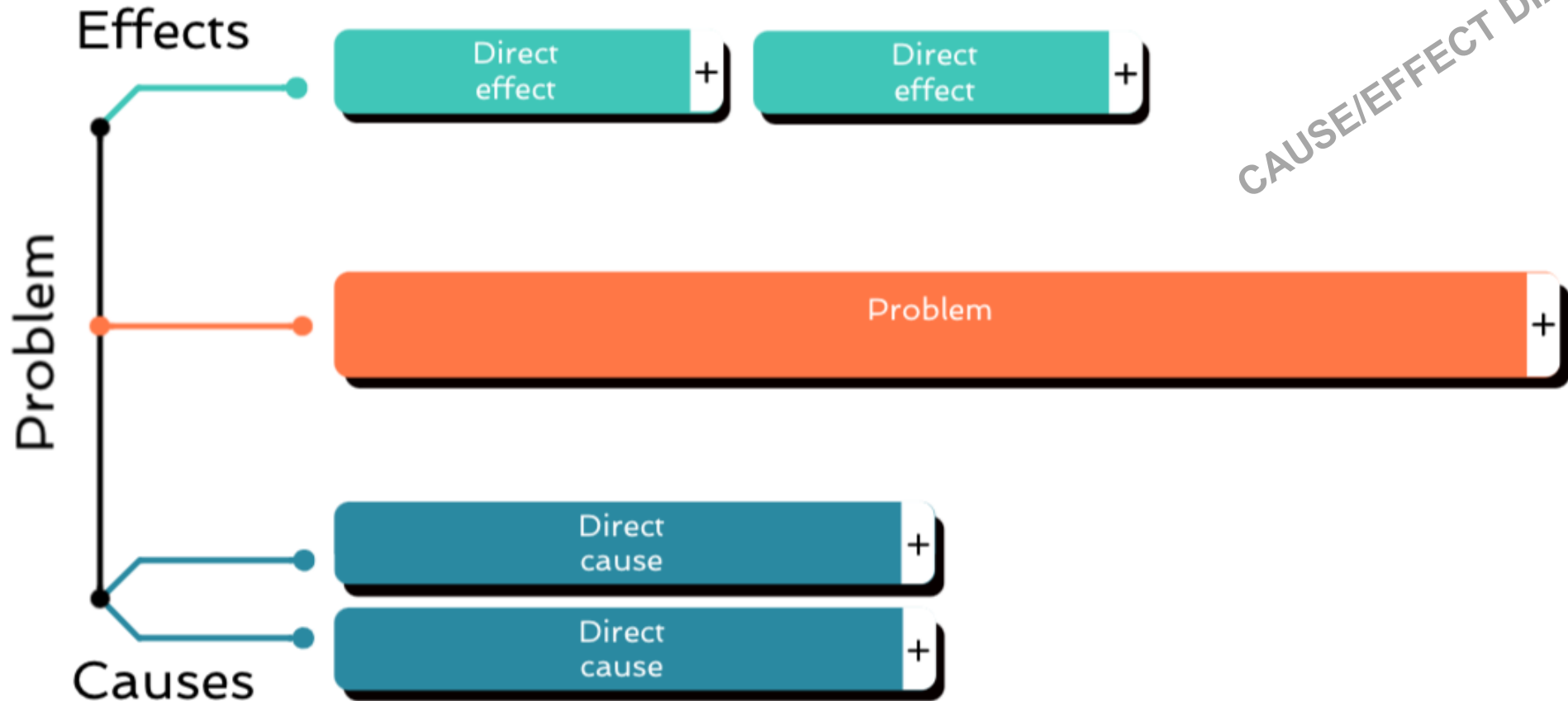
Objectives:

- Using 'Causal Models' to define research question – tree of problems exercise.
- Conducting a Systematic Bibliographic Search.
- Introducing students to the 'EBSCO Discovery Service'.
- Creating an 'Article Matrix' as a tool for systematizing information.

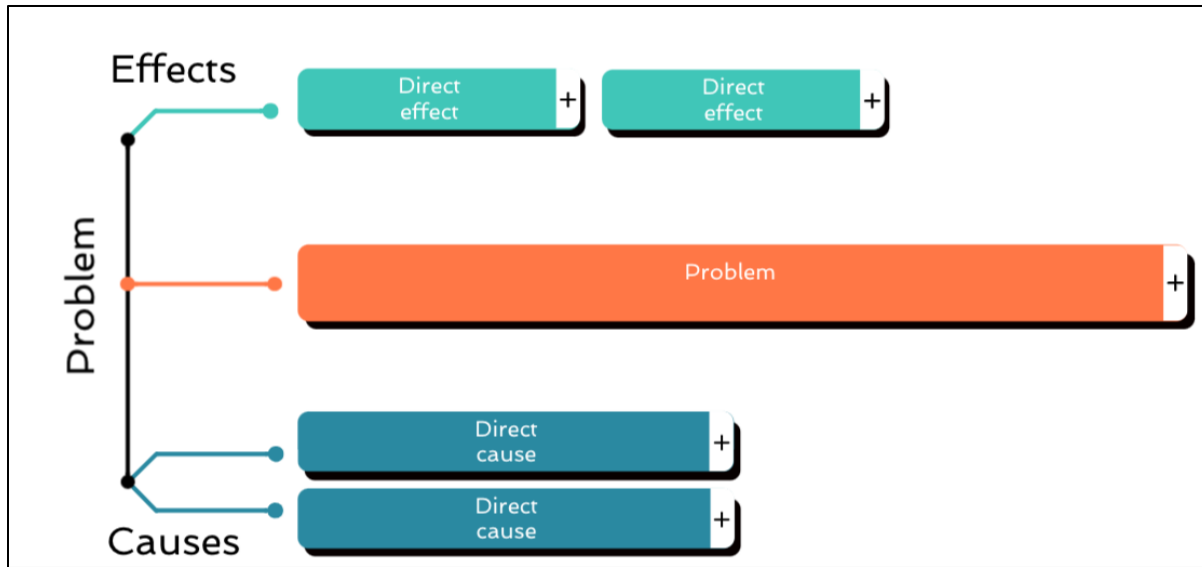
What are Causal Models?

- Representations of causal relationships between variables and factors.
- Represent how change in one variable causes change in another.
- Shed light on mechanisms of situations/configurations.
- More broadly, they can help us understand causes and interrelationships of problems in a community or system and,
- Give us a visual representation of causal pathways linking factors contributing to a problem.
- May facilitate individual and collective analysis and decision making.

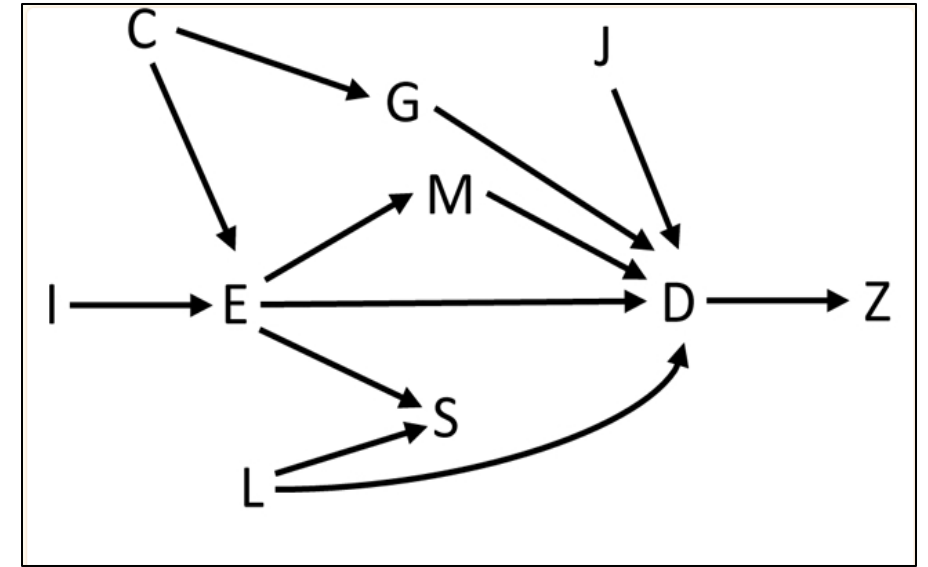
From theme to topic: **the Problem Tree and Causal Models**



From theme to topic: **Causal Diagrams and Models**



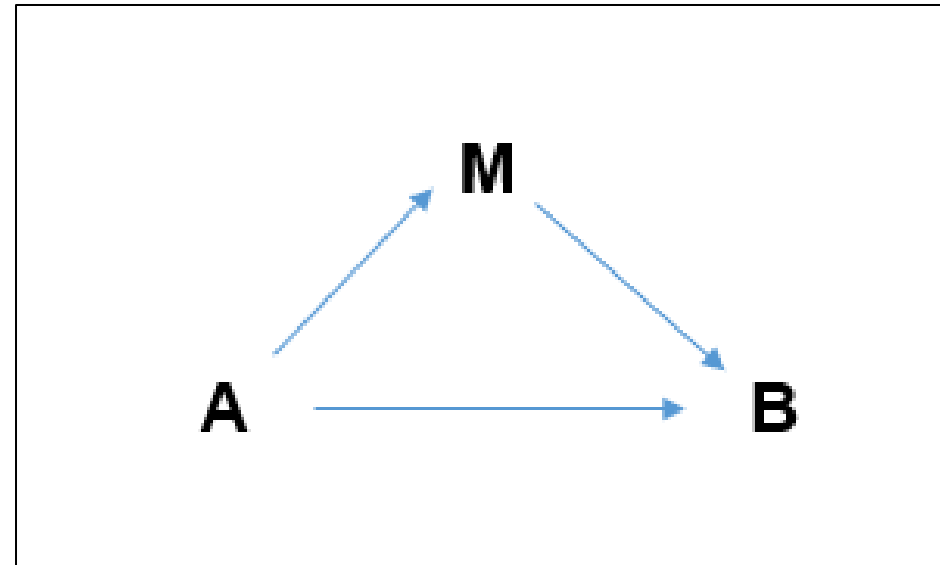
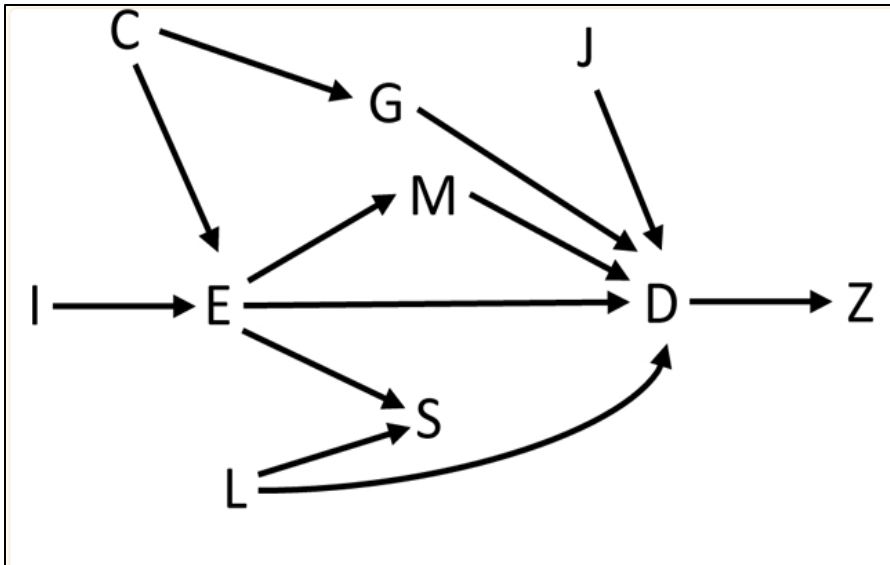
Cause/Effect



DAGs*

[†] [Taylor 2014](#); ^{*}[here](#) and [Digitale et al. 2023](#)

From theme to topic: **Causal Diagrams and Models**

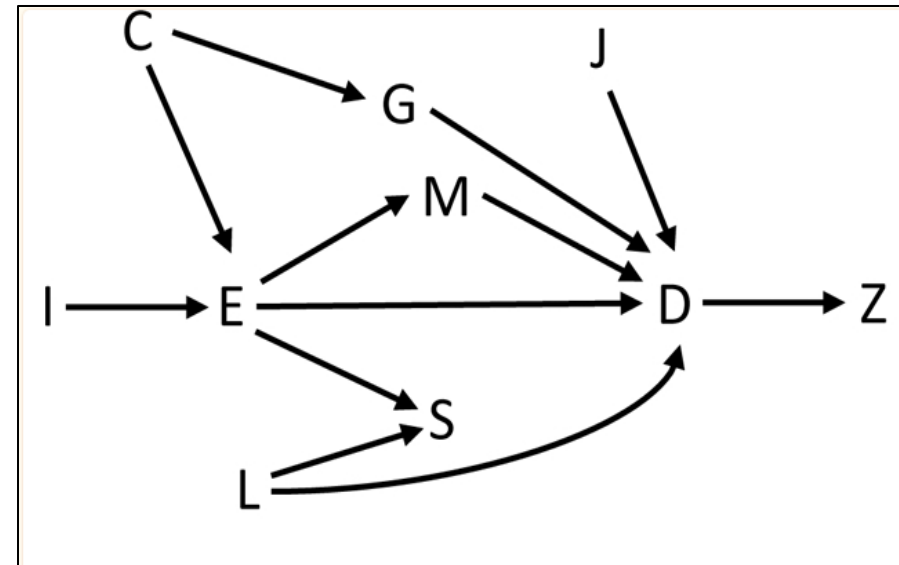


DAGs*

ACTIVITY

Causal Diagram and Models

- Same groups
- Starting from your tree of problems/objectives exercise draw a (simple) causal DAG A (Cause)-B (problem) and one **M (new)**, for one of the causes you identified.
- **15 min + 10 min discussion**



LITERATURE REVIEW

What we want in a Literature Review (Bryman, 2012)

- **Relevant concepts and theories on the topic.**
- **Research strategies and methods in commonly used to research similar topics.**
- **Assess facts with evidence (relative) in studies on the topic.**
- **Assess if there are methodological inconsistencies in produced evidence.**
- **Assess if there are research questions without an answer.**

Research Methods and Masters Project

From topic to literature review

- **A series of steps**



Systematic Bibliographic Search

Systematic Bibliographic Search

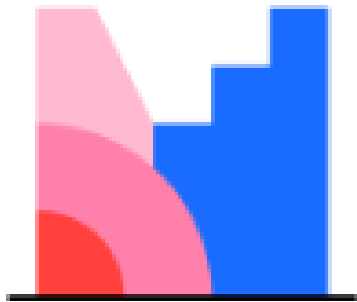
Where should I start?

Step 1: Keywords to guide your systematic Search

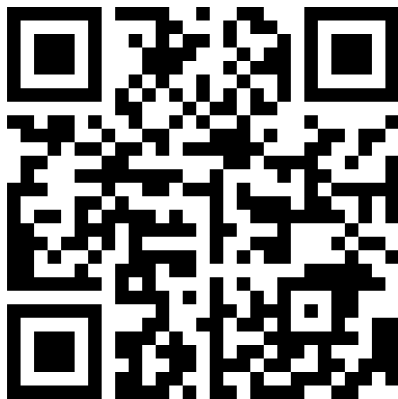
- i. Identifying key concepts for the Masters Project
- ii. Look for synonyms, similar concepts and abbreviations in annotated bibliography

	PART OF THE ANNOTATION	EXAMPLE
1	Reference Citation information in same format as required in Reference List	Griffiths, T. (1996). Hunters and collectors: The antiquarian imagination in Australia. Cambridge University Press.
2	Statement Short statement of author's viewpoint.	<ul style="list-style-type: none"> • The authors describe... • The author's purpose is to challenge...
3	Describe Short summary of theory, research findings or argument.	<ul style="list-style-type: none"> • The main ideas expressed are... • The author's research focuses on...
4	Comment Comment on usefulness/limitations of article/text for your research.	<ul style="list-style-type: none"> • The writing style considers a range of audiences... • There is a lack of supporting evidence... • The main limitation of the website...
5	Evaluate Evaluate the article/text, taking into account how it will fit into your research on a topic.	<ul style="list-style-type: none"> • This article is useful for the research topic... • It is relevant to the thesis because...

ACTIVITY



Mentimeter



WHO: Individual

WHAT: Write down keywords that would fit your topic idea(s) for the MP (does not have to be a final idea)

Min: 6 / Max: 10

WHERE: [Mentimeter](#)

HOW LONG: 5 Minutes

5:00

Step 2: Sources

NON-SCIENTIFIC LITERATURE

- i. Grey Literature;**
- ii. Newspapers and Magazines;**
- iii. Web;**

SCIENTIFIC LITERATURE

- **Primary Sources**
 - **Articles/Books with original empirical data/findings**
- **Secondary Sources**
 - **Articles/Books based on evidence from other sources:**
 - **Manuals;**
 - **Literature Reviews**
 - **Systematic Literature Reviews**
 - **Meta analysis**

Step 2: Sources

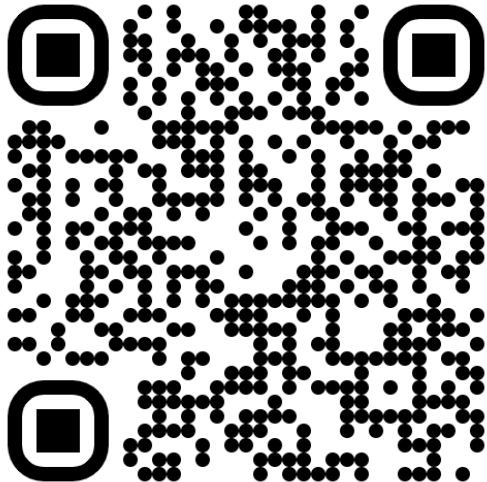
- **A systematic bibliographic search should be based exclusively on scientific literature and primary sources.**
- **However – there is non peer-reviewed scientific evidence that should not be used:**
 - **PhD theses;**
 - **Master dissertations;**
 - **Conference papers;**
 - **Unpublished papers even if posted in public repositories (SSRN, arXiv, etc.).**

Step 3: Define further search parameters

- Search fields: ex. 'Title', 'Abstract', 'Title and Abstract', etc.;
- Date: ex., '2000 – present';
- Language: ex., 'English' (according to preference/need);
- Area: ex., 'Management'; 'Sustainability'

Step 4: EBSCO discovery service at ISEG.

ISEG ULisboa library catalogue



ONLINECATALOG

Lisbon University's Online Catalog allows for searches in several organic units of the institution

General ▾ Search our catalog... Instituto Superior de Economia e Gest... ▾

Catalog

The library promotes the collection, processing, and dissemination of bibliographical information, support for pedagogical and scientific actions, and exchanges with national, foreign and international counterparts.

The Library was founded with the inauguration of the School in 1911 - then known as School of Commerce - in the Rua do Quelhas building. Its initial content consisted of 650 volumes. The Francisco Pereira de Moura Library has been added to over the years, and today it has one of the best collections in the country in the fields of Economics, Management, and Associated Sciences. The Library hosts the ISEG - based European Documentation Center of Universidade de Lisboa. Moreover, the library also made an agreement with the World Bank. It became the Depository Library of publications. The bibliographic catalog allows the research of the existing information in the Library, being also possible the access to several information systems online. The library building has 5 floors, 3 reading rooms offering 300 seats.

Eletronic resources



Scopus®



statista



Step 4: EBSCO discovery service.



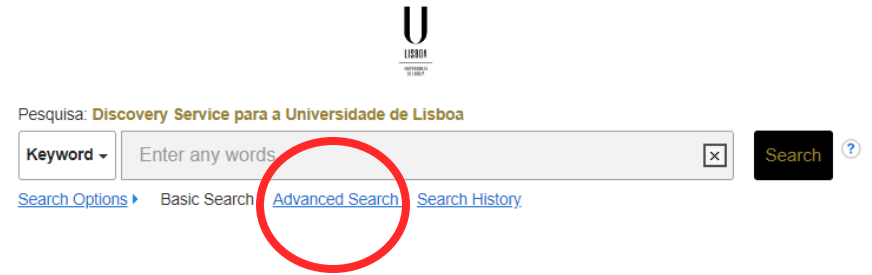
Pesquisa: **Discovery Service para a Universidade de Lisboa**

Keyword ▾ Enter any words

[Search Options](#) ▶ [Basic Search](#) [Advanced Search](#) [Search History](#)

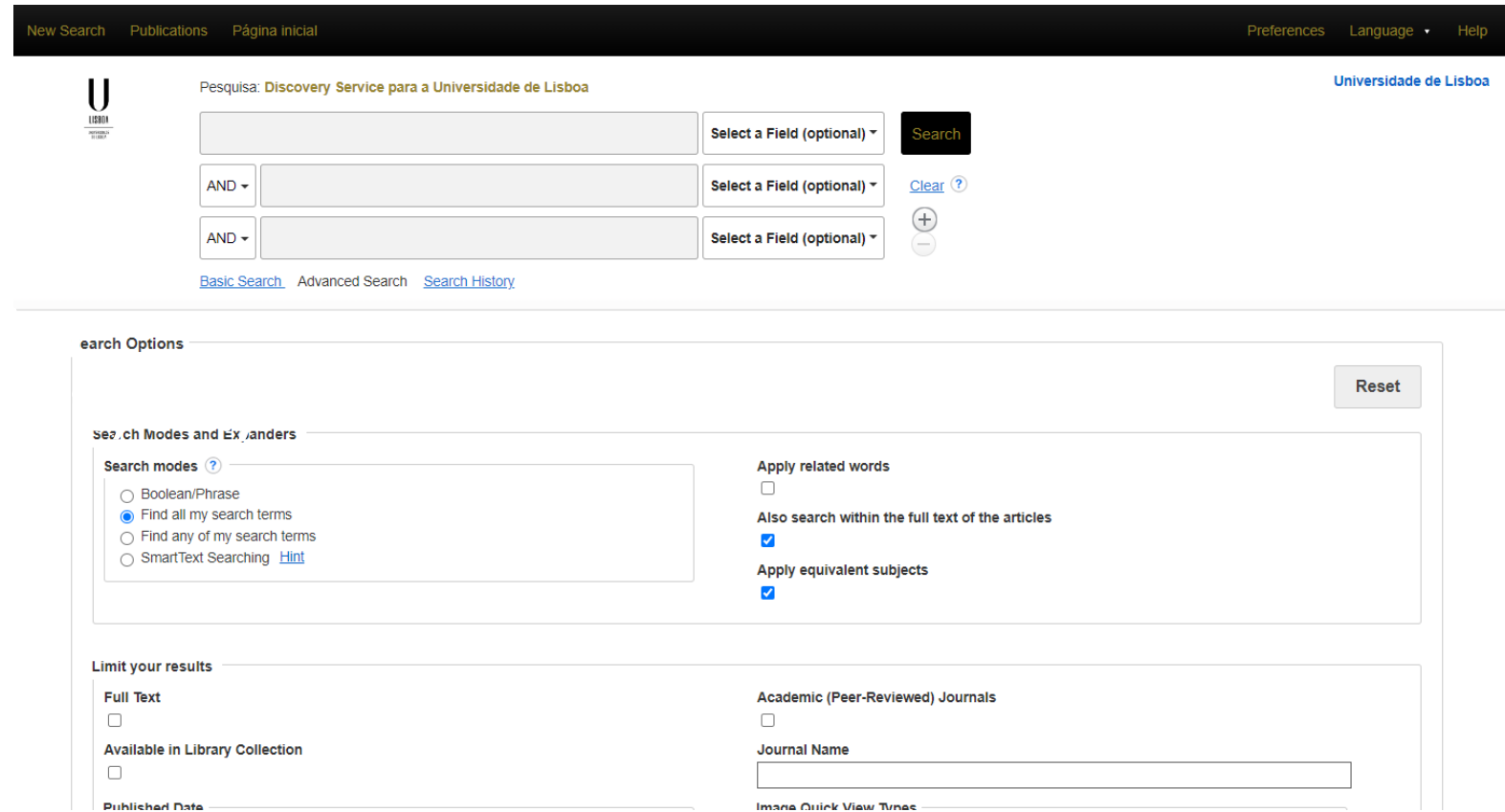
Step 4: EBSCO discovery service

- Choose advanced search.



Step 4: EBSCO discovery service

- Advanced search menu



The screenshot shows the EBSCO Discovery Service search interface. At the top, there is a navigation bar with links for "New Search", "Publications", and "Página inicial" on the left, and "Preferences", "Language", and "Help" on the right. The main search area features the University of Lisbon logo and the text "Pesquisa: Discovery Service para a Universidade de Lisboa". Below this, there are three search input fields, each with a "Select a Field (optional)" dropdown menu. A "Search" button is positioned to the right of the first field, and a "Clear" button is to the right of the second field. There are also "+" and "-" buttons for adding or removing search criteria. Below the search fields, there are links for "Basic Search", "Advanced Search", and "Search History".

The "Search Options" section is expanded, showing various settings:

- Search Modes and Expanders:**
 - Search modes: Boolean/Phrase, Find all my search terms, Find any of my search terms, SmartText Searching [Hint](#)
 - Apply related words:
 - Also search within the full text of the articles:
 - Apply equivalent subjects:
- Limit your results:**
 - Full Text:
 - Available in Library Collection:
 - Academic (Peer-Reviewed) Journals:
 - Journal Name:

A "Reset" button is located in the top right corner of the "Search Options" section.

Step 4: EBSCO discovery service

- First search term: TRAINING.

The screenshot shows the EBSCO Discovery Service search interface for the University of Lisbon. The search term "training" is entered in the search box. The interface includes a navigation bar with "New Search", "Publications", and "Página inicial". The search results are displayed under the heading "Pesquisa: Discovery Service para a Universidade de Lisboa". The search term "training" is highlighted in the search box. Below the search box, there are three dropdown menus for "Select a Field (optional)". The "Popular Terms" section lists several related terms: "training", "training and development", "training or education or development or learning", "training program", and "training and development of employees". The "Search Options" section includes "Search Modes a" and "Search modes". The "Search modes" section has three radio buttons: "Boolean/Phrase", "Find all my search terms" (selected), and "Find any of my search terms". There is also a link for "SmartText Searching". The "Limit your results" section includes checkboxes for "Full Text", "Available in Library Collection", and "Published Date". The "Apply related words" section has checkboxes for "Apply related words", "Also search within the full text of the articles" (checked), and "Apply equivalent subjects" (checked). The "Academic (Peer-Reviewed) Journals" section has a checkbox for "Academic (Peer-Reviewed) Journals" and a text input field for "Journal Name". A "Reset" button is located in the top right corner of the search options area.

Step 4: EBSCO discovery service

- First search term: **TRAINING.**
- Second search term: **RETENTION.**

The screenshot shows the EBSCO Discovery Service search interface. At the top, there are navigation links: "New Search", "Publications", "Página inicial", "Preferences", "Language", and "Help". The search bar contains the text "Pesquisa: Discovery Service para a Universidade de Lisboa". Below the search bar, there are two input fields: the first contains "training" and the second contains "retention". There are dropdown menus for "Select a Field (optional)" and a "Search" button. Below the search bar, there are "AND" dropdown menus and a "Clear" button. The interface also features a "Popular Terms" section with a list of terms including "retention", "retention or attrition or turnover", "retention or attrition or turnover or intent to leave or intent to stay", "retention strategies", and "retention rates". There is a "Publications" section with a list of titles including "Retention Strategies: The Key to Attract and Retain Excellent Employees", "Journal of College Student Retention: Research, Theory & Practice", "Retention (HR skills series)", "Retention in a Changing World of Work", and "Retention of Title: How to Keep Ownership of Your Goods and Recover Them When a Buyer Goes Under (Thorogoo...". The interface also has a "Search Options" section with "Search Modes and Expand" options: "Boolean/Phrase", "Find all my search terms" (selected), "Find any of my search terms", and "SmartText Searching". There is a "Limit your results" section with checkboxes for "Full Text", "Available in Library Collection", and "Published Date". There is also a "Reset" button and an "Apply equivalent subjects" checkbox.

Step 4: EBSCO discovery service

- Choose only scientific articles and books.

New Search Publications Página Inicial Preferences Language Help

Pesquisa: **Discovery Service para a Universidade de Lisboa** Universidade de Lisboa

training TI Title Search

AND retention TI Title Clear ?

AND Select a Field (optional)

- Select a Field (optional)
- TX All Text
- AU Author
- TI Title**
- SU Subject Terms
- SO Journal Title/Source
- AB Abstract
- IS ISSN
- IB ISBN

[Basic Search](#) [Advanced Search](#) [Search History](#) Reset

Search Options

Search Modes and Expanders

Search modes ?

- Boolean/Phrase
- Find all my search terms
- Find any of my search terms
- SmartText Searching [Hint](#)

Apply related words

Also search within the full text of the articles

Apply equivalent subjects

Limit your results

Full Text

Available in Library Collection

Published Date

Academic (Peer-Reviewed) Journals

Journal Name

Image Quick View Types

Step 4: EBSCO discovery service

- Choose only scientific articles and books;
- Accessible online;
- Peer reviewed.

The screenshot shows the EBSCO Discovery Service search interface for the University of Lisbon. The search bar contains the terms "training" and "retention" connected by "AND". The search options section includes "Search Modes and Expanders" with "Find all my search terms" selected, and "Apply related words" checked. The "Limit your results" section includes "Full Text" (unchecked), "Available in Library Collection" (unchecked), and "Published Date" (Start month: Month, Start year: , End month: Month, End year:). The "Academic (Peer-Reviewed) Journals" section is checked, and the "Image Quick View Types" section includes "Black and White Photograph" (unchecked) and "Chart" (unchecked).

Step 4: EBSCO discovery service

- **Dates: 2000 to 2024.**

Search Options Reset

Search Modes and Expanders

Search modes ?

Boolean/Phrase

Find all my search terms

Find any of my search terms

SmartText Searching [Hint](#)

Apply related words

Also search within the full text of the articles

Apply equivalent subjects

Limit your results

Full Text

Available in Library Collection

Published Date

Start month: Start year: — End month: End year:

Academic (Peer-Reviewed) Journals

Journal Name

Image Quick View Types

Black and White Photograph Chart

Color Photograph Diagram

Graph Illustration

Map

Collection

Catalog Only

Step 4: EBSCO discovery service

- Search concluded.

Search modes ?

Boolean/Phrase
 Find all my search terms
 Find any of my search terms
 SmartText Searching [Hint](#)

Apply related words

Also search within the full text of the articles

Apply equivalent subjects

Limit your results

Full Text

Available in Library Collection

Published Date
Start month: Start year: End month: End year:

Collection
All
David Rumsey Historical Maps
Farber Gravestone Collection
Japanese Historical Maps

Author

Academic (Peer-Reviewed) Journals

Journal Name

Image Quick View Types
 Black and White Photograph
 Color Photograph
 Graph
 Map
 Chart
 Diagram
 Illustration

Catalog Only

Language
All
Afrikaans
Albanian
Aleut

Title

Search

Step 4: EBSCO discovery service

- Saves search automatically.
- Easy to recover previous search with the better results.

The screenshot shows the EBSCO Discovery Service interface. At the top, there's a search bar with the query 'Training AND Retention' and a 'Pesquisar' button. Below the search bar, there's a 'Histórico de Pesquisas/Alertas' section with a table of search history. The table has columns for 'N.º de Identificação de Pesquisa', 'Termos de Pesquisa', 'Opções de pesquisa', and 'Ações'. A red box highlights the first search entry in the table, which is 'S1' with the terms 'TI Training AND TI Retention'. Below the table, there's a 'Refinar Resultados' section with a list of search results. The first result is '1. A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha' by Pathi, Anarath, Mila, Anbari, Paul, Subrata, published in 2020. The second result is '2. Inicie a sessão para obter acesso a este resultado.' with a note 'Integração Disponibilizada por: Scopus®'.

N.º de Identificação de Pesquisa	Termos de Pesquisa	Opções de pesquisa	Ações
S1	TI Training AND TI Retention	Limitadores - Texto Integral, Análisis pelos Países, Data de Publicação: 2000/01/01-2022/12/31 Expansores - Pesquisar também no texto integral dos artigos, Aplicar assuntos equivalentes Modos de pesquisa - Pesquisar todos os termos de pesquisa que indiquem	Ver Resultados (2.428) Ver Detalhes Dever Pesquisa

IMPORTANT

A satisfactory bibliographic sample:

- Identifies relevant evidence about our topic;
- Gives us several articles/books we can feasibly read/analyse.

The screenshot shows a web browser window displaying a search results page from a university library. The search terms 'Training AND Retention' are entered in the search bar. The results table shows one result with the title 'A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha'. The interface includes navigation buttons like 'Selecionar / Desmarcar todos', 'Pesquisar com AND', 'Pesquisar com OR', and 'Eliminar Pesquisas'. A red box highlights the search results table and the navigation buttons above it.

N.º de Identificação de Pesquisa *	Termos de Pesquisa	Opções de pesquisa	Ações
51	TI Training AND TI Retention	Limitadores - Texto Integral, Análisis pelos Pares, Data de Publicação: 2000/01-2022/12/31 Expansores - Pesquisar também no texto integral dos artigos, Aplicar assuntos equivalentes Modos de pesquisa - Pesquisar todos os termos de pesquisa que indiquem	Ver Resultados (2/2) Ver Detalhes Over Preview

Refinar Resultados: Resultados da Pesquisa 1 - 10 de 2.628

1. A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha
By: Pathi, Anarath; Mills, Anshari; Paul, Subrata. In: 2020 International Conference on Computer Science, Engineering and Applications (ICCSEA), Computer Science, Engineering and Applications (ICCSEA), 2020 International Conference on, 1-5 Mar. 2020. IEEE Language: English, Base de dados: IEEE Xplore Digital Library

2. Inicie a sessão para obter acesso a este resultado.

Before reaching a satisfactory bibliographic sample we need to go through an interactive process of widening and narrowing of the search terms.

The screenshot displays a search results page from a university library. The search terms used are 'Training AND Retention'. The results table shows one entry with the title 'A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha'. The interface includes a search bar, filters, and a list of search results.

N.º de Identificação de Pesquisa *	Termos de Pesquisa	Opções de pesquisa	Ações
51	TI Training AND TI Retention	Limitadores - Texto Integral, Análisis pelos Pares, Data de Publicação: 2000/01-2022/12/31 Expansores - Pesquisar também no texto integral dos artigos, Aplicar assuntos equivalentes Modos de pesquisa - Pesquisar todos os termos de pesquisa que indiqui	Ver Resultados (2/12) Ver Detalhes Over Preview

Refinar Resultados - Resultados da Pesquisa 1 - 10 de 2.628

1 A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha
By: Pathi, Anarath; Mills, Anshari; Paul, Subrata. In: 2020 International Conference on Computer Science, Engineering and Applications (ICCSEA), Computer Science, Engineering and Applications (ICCSEA), 2020 International Conference on... 1-5 Mar. 2020. IEEE Language: English, Base de dados: IEEE Xplore Digital Library

2 Inicie a sessão para obter acesso a este resultado.
Integração Disponibilizada por: Scopus®

Widening bibliographic search terms:

- Include search terms that are either synonymous or close to our search terms;
- Widen search period;
- Remove search filters.

The screenshot shows a web browser window displaying a search results page from a university library. The search terms used are 'Training' and 'Retention'. The results table is highlighted with a red box and contains the following information:

N.º de Identificação de Pesquisa *	Termos de Pesquisa	Opções de pesquisa	Ações
51	TI Training AND TI Retention	Limitadores - Texto Integral, Análisis pelos Pares, Data de Publicação: 2000/10/1-2022/12/31 Expansores - Pesquisar também no texto integral dos artigos, Aplicar assuntos equivalentes Modos de pesquisa - Pesquisar todos os termos de pesquisa que indiqui	Ver Resultados (2.628) Ver Detalhes Over Pesquisa

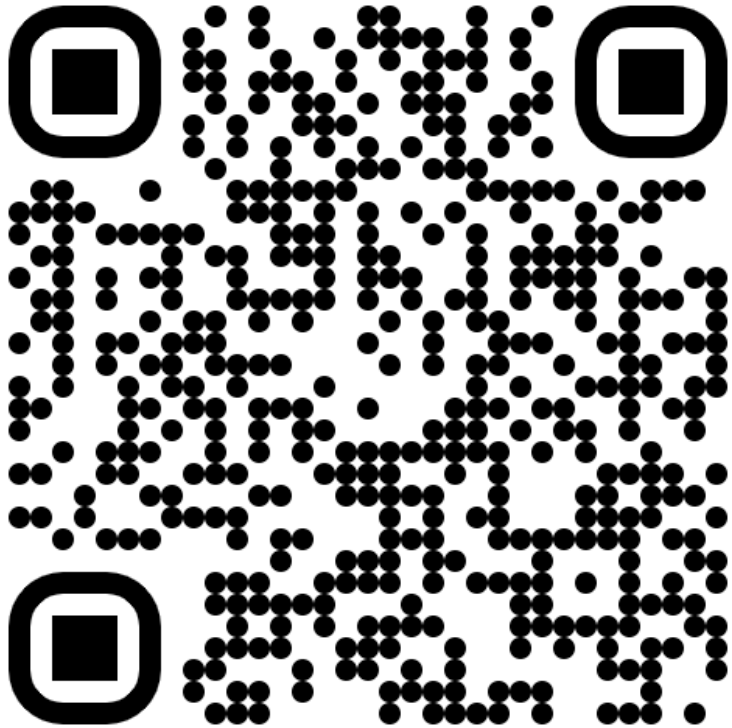
Below the table, the first result is visible: '1. A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha'. The author is listed as 'By: Pathi, Anarath; Mills, Anshari; Paul, Subrata'. The publication is from the '2020 International Conference on Computer Science, Engineering and Applications (ICCSEA)', held in 2020. The language is English and it is available in the IEEE Xplore Digital Library. A 'Full Text Finder' and 'Google Scholar' icon are also present. A second result is partially visible: '2. Inicie a sessão para obter acesso a este resultado.' with a note 'Interação Disponibilizada por: Scopus®'.

Refine bibliographic search terms:

- Add search terms that help us set the output of interesting bibliography better;
- Add filters to our search (ex: language).

The screenshot displays a web browser window with a search engine interface. The search terms 'Training' and 'Retention' are entered in separate fields, with 'AND' selected between them. Below the search fields, there are options for 'Pesquisa Básica', 'Pesquisa Avançada', and 'Histórico de Pesquisas'. A table of search results is visible, with the first result highlighted in a red box. The table has columns for 'N.º de Identificação de Pesquisa', 'Termos de Pesquisa', 'Opções de pesquisa', and 'Ações'. The first row shows 'S1' for the identifier, 'TI Training AND TI Retention' for the search terms, and various options like 'Limitadores', 'Expansores', and 'Modos de pesquisa'. Below the table, there is a 'Refinar Resultados' section with a sidebar for filtering options like 'Pesquisar todos os termos de pesquisa que indicou', 'Expansores', 'Limitadores', and 'Texto Integral'. The main content area shows a list of search results, with the first one being '1. A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha' by Pathi, Anarath, Milta, Anshari, Paul, Subrata, published in 2020.

ACTIVITY



WHO: Individual

WHAT: Create an EBSCO search of 3 terms.
Search field: 'Title'.
Full text, peer-reviewed
2000 – 2023.

WHERE: [ISEG library catalogue](#)

HOW LONG: 5 Minutes

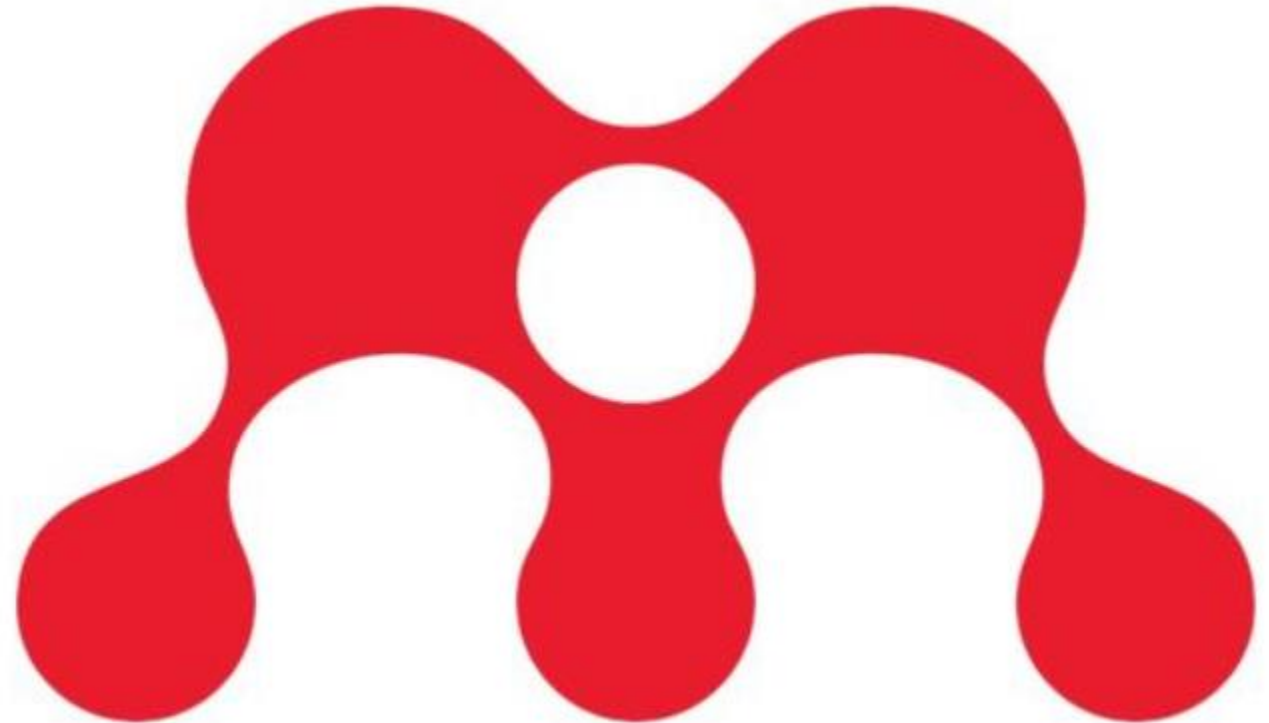
After setting up the best search, we need to filter down the articles we will actually include in the literature review.

The screenshot shows a web browser window displaying a search results page from a university library. The search query is "Training AND Retention". The results table shows one entry with the title "A Study on the Analysis of Training and Retention Strategies in some selected IT sectors at Odisha". The entry includes the author "By: Padh, Ananath; Mita, Anshu; Paul, Subrata", the conference name "2020 International Conference on Computer Science, Engineering and Applications (ICCSEA)", and the date "1-5 Mar. 2020". The interface includes search filters, a "Refinar Resultados" sidebar, and options to view the full text or download the PDF.

N.º de Identificação de Pesquisa *	Termos de Pesquisa	Opções de pesquisa	Ações
51	TI Training AND TI Retention	Limitadores - Texto Integral, Análisis pelos Pares, Data de Publicação: 2000/01-2022/12/31 Expansores - Pesquisar também no texto integral dos artigos, Aplicar assuntos equivalentes Modos de pesquisa - Pesquisar todos os termos de pesquisa que indiqui	Ver Resultados (2/32) Ver Detalhes Download

Step 5: Select articles and archive them

- Ordering or referencing software (ex. [Mendeley](#)).



Step 6: Systematize evidence

- **Using an Article Matrix**

Table 3.1: Summary table

Author/ Year	Research Design	Participants or Population Studied	Comparison	Outcome
Smith/2010	Mixed methods	Undergraduates	Graduates	Improved access
King/2016	Survey	Females	Males	Increased representation
Miller/ 2011	Content analysis	Nurses	Doctors	New procedure

Mauldin e DeCarlo, SD

You will have a lot of very diverse articles to use so it is useful to systematize the information:

Article Matrix

Table 3.1: Summary table

Author/ Year	Research Design	Participants or Population Studied	Comparison	Outcome
Smith/2010	Mixed methods	Undergraduates	Graduates	Improved access
King/2016	Survey	Females	Males	Increased representation
Miller/ 2011	Content analysis	Nurses	Doctors	New procedure

Mauldin e DeCarlo, SD

Article Matrix Items (minimum):

- **Author(s);**
- **Publication Year;**
- **Main objective of article;**
- **Methods/research design;**
- **Topic and research object (case study, sample, etc.);**
- **Findings.**

Table 3.1: Summary table

Author/ Year	Research Design	Participants or Population Studied	Comparison	Outcome
Smith/2010	Mixed methods	Undergraduates	Graduates	Improved access
King/2016	Survey	Females	Males	Increased representation
Miller/ 2011	Content analysis	Nurses	Doctors	New procedure

Mauldin e DeCarlo, SD

The literature review:

- With all the information systematized you can write the literature review
- It is a narrative, where you tell the story of what has been said about the topic and how it relates to your research question/hypothesis or argument (gap in the literature, further inquiry on a topic, specific line of study, etc.)
- The literature review set the background for the development of your work on the topic you choose in any of the modalities of Masters' Project you Choose.

How to write a literature review



 Scribbr

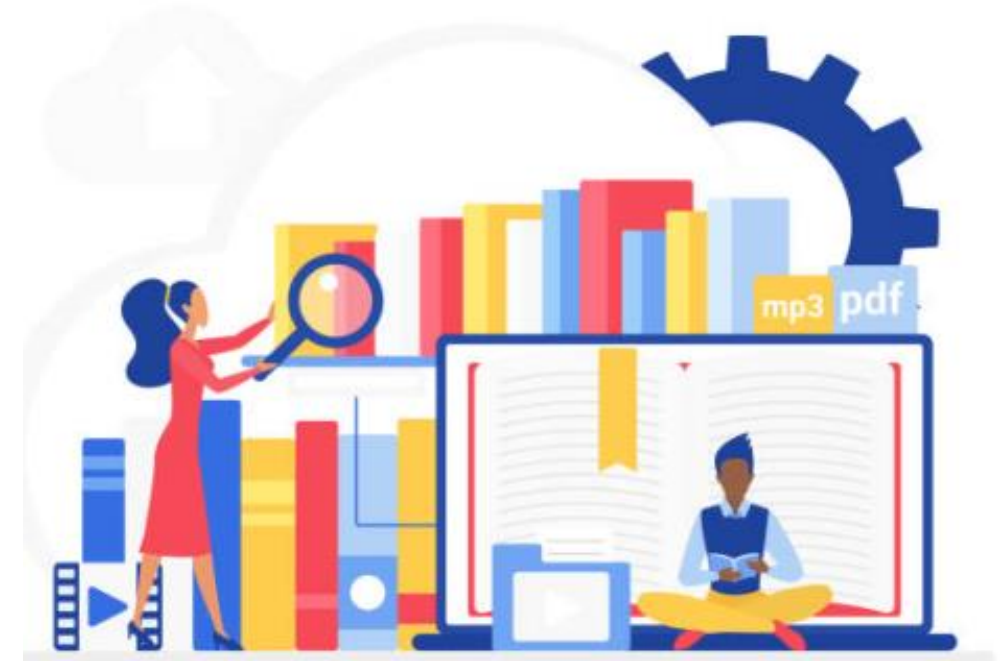


The literature review:

- Overview and your topic
- Research question/objective of review
- Organize literature (dates, subject, concepts, etc. - remember **article matrix**)
- Identify gaps, inconsistencies and contradictions (remember the **annotated bibliography** and the **critical reading**)
- Identify weaknesses or limits of studies used
- Summarize and conclude – implications, gaps, further research...
- Your MP's place within this literature configuration – what literature/conceptual challenge are you responding to?

More details here:

- Galvan et al. 2017: Reporting
- Zemach and Rumisek 2005: Academic Writing



ACTIVITY



WHO: Individual

WHAT: Article Matrix.

Min. 5 Articles of your choice.

WHERE: MsTeams

HOW LONG: 9-04-2024