Elementary, my Dear Watson

Description	This activity will allow students to assess sources provided by Google when they look for information and to identify strategies to assess the truthfulness and reliability of the information retrieved.
Tag	• News • Social Media
Skills	**CONTENT MANAGEMENT SKILLS** • To search, select and download **MEDIA AND TECHNOLOGY** • To take action and apply **IDEOLOGICAL AND ETHICS** • To evaluate and reflect • To take action and apply
Learning areas	• Sciences • Social Sciences • Technologies
Card language	• English • Spanish • Italian

Structure

Sessions	3 (variable)
Duration	55' (variable)
Number of participants	10-30 participants
Age	• 17-18
Materials	• Computer or mobile phone • Google search

Process

Key questions

- What search engine do I use to get information?
- How do I make the search?
- How many and which sources do I read after a search?
- What features do I use to decide whether to trust or not the information I find on the internet?
- What do I do with the information that I find on the Internet?

Development

The teacher proposes a brainstorming of ideas regarding strategies for surfing the net for information. Then, also collectively, the teacher motivates students to ask questions regarding this topic.
Suggestion: Guide them to think of topics based on their interest in the truthfulness of a piece of information they found on the net or the need to widen a piece of information.
The teacher and students choose one of the questions on which the activity will be based.
The proposal will be to look for information and answers to that question.
(**20'-25'**)
The teacher divides the students into groups of three or four students.
The teacher tells the groups they will look for information about the chosen question on the internet to develop a brief text on that question.
Each group has to follow the specific teacher's instructions related to how the search will be done.
Instruction A: Students can only surf the first hit which appears in Google.
Instruction B: Students can only surf two of the first three hits in Google.
Instruction C: Students cannot enter any of the three first hits in Google.
(**5 '-10'**)
The teams look for the information and write their answers. (**10' to 20'- Variable according to the complexity of the question**)
The teams join other teams with the same instructions (A, B or C) and compare their texts. (**5'**)
• Did they generate similar texts?
• Did they use the same sources?
• Did they choose the same information within the same source?
• Did they surf the net following hyperlinks inside the site?
We must underline that using Google from different accounts can emerge different results. Compare the differences and reflect about the algorithms of Google that provide different information according to the profile.
Three sub-groups with different instructions get together.
Answers generated by each of them are compared. (**5' to 10'**)
• Did they get the same information or are there inconsistencies in the information gathered?
• In case of inconsistencies, how could the information be checked?
Pooling. Discussion about their reflections and aspects discussed in the two previous stages. Focus on the strategies discussed to verify the information.
(**15'**)

The teacher systematizes, together with students, the criteria for analysing the reliability of information found on the net and presents a model (Gavilan, Pindo) to look for information, information retrieval and information assessment. The teacher proposes to do the activity again and to adjust the initial answers.
(**10'**)

The session finishes with the presentation of answers and a reflection on the amendments.
(**10'**).

Suggestion: use this section as a revision session at the end of a thematic unit or as a preparation for an exam or evaluation.
Before the lesson, the teacher prepares questions on the specific topic to be reviewed. Students are divided into teams. Session objectives are set: to consolidate knowledge, as a revision and expansion on topics dealt with previously in the course, the teams have to look for information and prepare answers that are as complete as possible to the proposed questions.
The activity is set as a game in which points are awarded to each team according to the resources used, time and how much they take advantage of the strategies discussed in the previous session.
(**5'**)
Before starting the game, a rubric or a chart of desirable proceedings for making the searches is collectively designed with the correlative points the teams would earn if they follow them.
Other rules the teams would like to establish could be discussed and agreed on. Example: whether all the members of the team have to participate in the process, whether it is allowed to use one or more devices per group, whether the teams have to make the sources used explicit, etc.
Still, the rule of earning points due to time is kept, this is to say, due to answering the highest number of questions in the established time.
(**20'**)
Each team receives an extensive list of questions. The teacher sets a time limit and the game starts.
Alternative: Instead of sharing all the list of questions with the students, the teacher can give each team just the first question. When each team finishes the first answer, they have to ask for the following question and so on.
An online tool can be chosen to share the following questions to the teams (group in a social network, message on an educational platform, etc.)
Variable duration according to the time established by the teacher depending on the complexity of the topics.
At the end of the time, each team shares its answers with the rest. A platform all the students can access can be used or a shared folder can be created for all the groups' answers.
All the general points are added, such as those earned by number of answer or having followed the general guidelines.
Then, the students are in charge of awarding more detailed points, due to the quality of the answers. Sub groups are made with a member from each team. Each sub group is assigned some questions to analyse their answers and award points. The teacher monitors the process.
At the end, points can be added up and the winner is announced.
A website or platform can be used to keep the score and announce the winner. Example: https://keepthescore.co/
Duration: Variable according to the complexity of topics
The activity is rounded up with a reflection in groups in two stages. In the first place, there will be a group reflection on the game and what we can learn from it. (10')
Suggested questions:
• Could you put into practice the criteria and strategies discussed?
• What did you decide to prioritize?
Shortest time to answer more questions.
Quality of answers to gain more points per question
• In general, when you study, what is the relationship between time dedicated to looking for information and its quality? What do you tend to prioritize? Why?
Secondly, each student individually completes a brief 3-2-1 self-assessment chart (**10'**):
• **3 -** Three things learned on the topic.
• **2** - Two interesting things which he/she would like to learn more about.
• **1 -** Questions or doubts he/she still has.

Evaluation	A metacognitive collective assessment can be carried out regarding aspects to be considered when looking for and selecting information from the internet. A checklist of the main features to be taken into consideration in future searches can be developed.
References for professors	• Keeping record of the score of several teams or players. Example: https://keepthescore.co/
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