# PRISMA 2020 Main Checklist

| **Topic** | **No.** | **Item** | **Location where item is reported** |
| --- | --- | --- | --- |
| **TITLE** |  |  |  |
| **Title** | 1 | Identify the report as a systematic review. | -Exploring the Impact of YouTube Videos on Improving Listening Skills for EFL Secondary School Students in Sudan |
| **ABSTRACT** |  |  |  |
| **Abstract** | 2 | See the PRISMA 2020 for Abstracts checklist |  |
| **INTRODUCTION** |  |  |  |
| **Rationale** | 3 | Describe the rationale for the review in the context of existing knowledge. | - |
| **Objectives** | 4 | Provide an explicit statement of the objective(s) or question(s) the review addresses. | -This study's objectives were to (1) investigate the amount to which English as a Foreign Language (EFL) secondary school students in Sudan benefit from watching YouTube videos in order to enhance their listening abilities, and (2) establish the extent to which EFL learners watch YouTube videos in order to improve their listening skills. |
| **METHODS** |  |  |  |
| **Eligibility criteria** | 5 | Specify the inclusion and exclusion criteria for the review and how studies were grouped for the syntheses. | -Students from forty-seven different Sudanese secondary schools who are taking English as a foreign language |
| **Information sources** | 6 | Specify all databases, registers, websites, organisations, reference lists and other sources searched or consulted to identify studies. Specify the date when each source was last searched or consulted. | - |
| **Search strategy** | 7 | Present the full search strategies for all databases, registers and websites, including any filters and limits used. | - |
| **Selection process** | 8 | Specify the methods used to decide whether a study met the inclusion criteria of the review, including how many reviewers screened each record and each report retrieved, whether they worked independently, and if applicable, details of automation tools used in the process. | -The data were collected in this study using a questionnaire as a data gathering device. |
| **Data collection process** | 9 | Specify the methods used to collect data from reports, including how many reviewers collected data from each report, whether they worked independently, any processes for obtaining or confirming data from study investigators, and if applicable, details of automation tools used in the process. | -The questionnaire was designed based on the five questions of the study so as to investigate the impact of using YouTube videos presented by specialists in the field of teaching English as a foreign language on enhancing English language listening skills. Each item has five degrees describing participants’ responses starting from (Strongly Disagree) which has given 1 point, then (Disagree) which has given 2 points, and (Neutral) which has given 3 points, before thelast (Agree) which has given 4 points and finally (Strongly Agree) has given 5 points. The axes of the questionnaire contain twenty-four items which represent the sub-skills proposed by (Walker & Goodith 2017) in a list of listening abilities which learners need to develop based on a combination of experiences in teaching listening which are needed by EFL learners to improve their listening skills using YouTube videos. |
| **Data items** | 10a | List and define all outcomes for which data were sought. Specify whether all results that were compatible with each outcome domain in each study were sought (e.g. for all measures, time points, analyses), and if not, the methods used to decide which results to collect. | -All of the students studied the English language as a major required course of the Sudan government syllabus of the secondary schools which qualifies them to enter universities. |
|  | 10b | List and define all other variables for which data were sought (e.g. participant and intervention characteristics, funding sources). Describe any assumptions made about any missing or unclear information. | -Participants had at least 4 years of experience surfing the internet and watching YouTube videos. |
| **Study risk of bias assessment** | 11 | Specify the methods used to assess risk of bias in the included studies, including details of the tool(s) used, how many reviewers assessed each study and whether they worked independently, and if applicable, details of automation tools used in the process. | - |
| **Effect measures** | 12 | Specify for each outcome the effect measure(s) (e.g. risk ratio, mean difference) used in the synthesis or presentation of results. | - |
| **Synthesis methods** | 13a | Describe the processes used to decide which studies were eligible for each synthesis (e.g. tabulating the study intervention characteristics and comparing against the planned groups for each synthesis (item 5)). | - |
|  | 13b | Describe any methods required to prepare the data for presentation or synthesis, such as handling of missing summary statistics, or data conversions. | - |
| 13c | Describe any methods used to tabulate or visually display results of individual studies and syntheses. | - |
| 13d | Describe any methods used to synthesize results and provide a rationale for the choice(s). If meta-analysis was performed, describe the model(s), method(s) to identify the presence and extent of statistical heterogeneity, and software package(s) used. | - |
| 13e | Describe any methods used to explore possible causes of heterogeneity among study results (e.g. subgroup analysis, meta-regression). | - |
| 13f | Describe any sensitivity analyses conducted to assess robustness of the synthesized results. | - |
| **Reporting bias assessment** | 14 | Describe any methods used to assess risk of bias due to missing results in a synthesis (arising from reporting biases). | - |
| **Certainty assessment** | 15 | Describe any methods used to assess certainty (or confidence) in the body of evidence for an outcome. | - |
| **RESULTS** |  |  |  |
| **Study selection** | 16a | Describe the results of the search and selection process, from the number of records identified in the search to the number of studies included in the review, ideally using a flow diagram. | -page 5, result  Firstly, the responses of the students to each axis of the questionnaire are statistically analysed to find the mean in order to find where the centre value is located and to make projections about a standard of normalcy within the students who respond to the questionnaire. Second, the standard deviation of each axis is calculated to find how spread out the data is. It is a measure of how far each observed value is from the mean in any distribution. Then the percentages of the items are calculated to find the highest and the lowest so as to set the directions of the samples and their ranks. |
|  | 16b | Cite studies that might appear to meet the inclusion criteria, but which were excluded, and explain why they were excluded. | - |
| **Study characteristics** | 17 | Cite each included study and present its characteristics. | - |
| **Risk of bias in studies** | 18 | Present assessments of risk of bias for each included study. | - |
| **Results of individual studies** | 19 | For all outcomes, present, for each study: (a) summary statistics for each group (where appropriate) and (b) an effect estimate and its precision (e.g. confidence/credible interval), ideally using structured tables or plots. | -It appears that the second statement (Discriminating between sounds) has the highest mean (M=3.8), (75.7%), this shows that students’ responses move towards the sample direction of the response (Agree) which makes this statement’s rank number one, the SD (6.7) represents a far distance from the mean as a result of the differences between the statements’ answers. The first statement (Observing individual sounds) comes second in order, it has the second mean (M=3.6). The third statement (Indicate diminished sounds in connected speech.) represents a direction to the response (Neutral) with (M=3.2) mean and (64.7%) of the sample, but (SD =2.3) shows a far distance difference between the students’ responses. The statement (Identifying stressed syllables) comes in the fourth rank with (M=3.1) and (61.3%) and its (SD=1.1) demonstrates that the values gathered around the average.  In the second part of the questionnaire, it is shown that the responses of students (Identifying individual word boundaries), (Identifying words), (Building an idea about how the words are connected in meaningful units), (Pinpointing ‘key’ words that provide an idea about the topic), (Determining discourse markers which construct and explain attitudes towards speech) and (Inferring the meaning of unknown words), display means in the area of (Agree) because all the statements have no significant differences between values. They also represent their percentages between (70.6%) in the highest score and (75.3%) in the lowest score which display similarities in their responses. (SD=1.75) and (SD=0.17) which indicate that the values tend to be the same as the means and not far from them.  The statements of part three of the questionnaire are designed to evaluate students’ ability to get the meaning using their previous information about the topic. The three items (Applying knowledge about the arrangement that appropriate oral interactions frequently take), (Applying knowledge about the arrangements that appropriate oral interactions frequently take) and (Practicing awareness of the topic to hunch what the speaker will say about it), these three items’ take the sample direction towards (Agree) because their means (3.6), (3.6) and (3.5), represent similarities in students’ responses. Their percentages also (72.8%), (72.3) and (70.6) show similarities. The SDs (5.18), (5.41) and (5.32) indicate that the values tend to be far from their means.  This similarity indicates that the responses gathered in the central part of the questionnaire, this similarity displays that the direction of the sample moves towards (Agree) without significant differences in their percentages (74.9), (74), (72.34) and (71.1). All of the items on this axis have semi-similar means (3.7), (3.7), and (3.6). The values have a tendency to be somewhat distant from the means as a result of the considerable variations between the replies, as indicated by the standard deviations of the four items, which are as follows: (6.19), (5.37), (5.13) and (5.18).  In the fifth axis the response to the third item (Identifying the speaker’s mood/attitude) shows the highest mean (3.7). But it also it displays an odd standard deviation (7.5) which indicates that the values are far from the central tendencies such as the mean. It has the highest percentage (74.9%) and it goes towards (Agree) as a sample direction. The second item (Recognizing the speaker’s intention) displays the second highest mean (3.5), but also it displays an odd standard deviation (6.6) which indicates that the values are far from the central tendencies such as the mean. It has the second highest percentage (69.4%) and it goes towards (Agree) as a sample direction.  Item 4 (Anticipating what the speaker will say later), and item 5 (Noticing turn-taking signals) and 1 (Pinpointing the speaker’s attitude) show means (3.3), (3.3) and (3.2) which explain similarities between students’ responses to them, in addition to semi-similar standard deviation values (5.4), (5.9) and (5.3) which indicate that the values are far from the central tendencies. Their percentages are semi-equal (66.4%), (66.3%) and (64.7%), all of them are found in (Not Sure) sample direction.  The last item (Developing a return to what the speaker has said.) explains the lowest mean (2.7) which is (Neural), sample direction with percentage (54.1%) tends to be (Disagree). It has the lowest SD (2.0), which indicates that this value has tended towards the central tendencies. |
| **Results of syntheses** | 20a | For each synthesis, briefly summarise the characteristics and risk of bias among contributing studies. | - |
|  | 20b | Present results of all statistical syntheses conducted. If meta-analysis was done, present for each the summary estimate and its precision (e.g. confidence/credible interval) and measures of statistical heterogeneity. If comparing groups, describe the direction of the effect. | - |
| 20c | Present results of all investigations of possible causes of heterogeneity among study results. | - |
| 20d | Present results of all sensitivity analyses conducted to assess the robustness of the synthesized results. | -- |
| **Reporting biases** | 21 | Present assessments of risk of bias due to missing results (arising from reporting biases) for each synthesis assessed. | - |
| **Certainty of evidence** | 22 | Present assessments of certainty (or confidence) in the body of evidence for each outcome assessed. | - |
| **DISCUSSION** |  |  |  |
| **Discussion** | 23a | Provide a general interpretation of the results in the context of other evidence. | -(66.80%) of the students are aware of the importance of listening skills  (33.20%) of the students do not have sufficient perception about how these videos can help them, they need more guidance by teachers to increase their awareness about these videos, and they also need to be informed about how video sharing libraries have great roles in enhancing their skills.  (73.33%) of the students can match sounds to language items in an effort to move towards understanding meaning using when watching YouTube videos, and this percentage is not ideal.  In investigating the ability to understand and clarify the meaning of a spoken message using knowledge of the world, (71.90%) of the students are able to do that, but not at the highest level because (28.10%) cannot interpret the meaning.  (73.09%) of the students said they that watching YouTube videos has improved their ability to deal with information said by speakers, (26.01%) lack the ability to deal with information in when they listen to YouTube videos, these students need more practice using other techniques such as electronic dictionaries in accompany with watching native-speakers’ videos.  (56.97%) of the students have the ability to communicate with speakers, if he requires a reply, they can interact with him freely. (43.03%) of the students do not have the ability to developing a turn taking techniques to respond to what the speaker has said, they lack the ability to oppose with changes among speakers, in this level, the students need to improve their speaking skills because listening mirrors speaking. |
|  | 23b | Discuss any limitations of the evidence included in the review. | -Few limitations should be stated and showed for more and additional research. Personality traits of the participants which may have impacts on the results are not measured.  The size of the sample participated in this study was not big, and the activities applied by students for their learning process learning were short, both of which factors may limit any broad generalizations being drawn from the results. |
| 23c | Discuss any limitations of the review processes used. | - |
| 23d | Discuss implications of the results for practice, policy, and future research. | -address these limitations. Furthermore, a study on the role of YouTube in improving speaking skills will be carried out to fill the gap between the two spoken skills (listening and speaking). |
| **OTHER INFORMATION** |  |  |  |
| **Registration and protocol** | 24a | Provide registration information for the review, including register name and registration number, or state that the review was not registered. | - |
|  | 24b | Indicate where the review protocol can be accessed, or state that a protocol was not prepared. | - |
| 24c | Describe and explain any amendments to information provided at registration or in the protocol. | - |
| **Support** | 25 | Describe sources of financial or non-financial support for the review, and the role of the funders or sponsors in the review. | - |
| **Competing interests** | 26 | Declare any competing interests of review authors. | - |
| **Availability of data, code and other materials** | 27 | Report which of the following are publicly available and where they can be found: template data collection forms; data extracted from included studies; data used for all analyses; analytic code; any other materials used in the review. | - |

Abstracgt: This study was carried out with the participation of forty-seven (47) high school students who were required to take English in order to continue their education at the university level. The participants were asked to respond to a given questionnaire composed from (5) axes, each axis has many items, the target was to explore the effect of watching YouTube on listening skills. Their responses were analyzed statistically, the results showed that some students were aware of the importance of listening skills and few do not have the sufficient perception about how these videos can help them. Their ability to interact with the speaker was showed as one of the most required skills, mastering this skill helps the students to interact with speakers. Students' ability to process information has been boosted by watching YouTube videos, and most will speak up if the presenter requests it, but many still struggle to come up with an appropriate answer to what was said, and many more are unable to adapt to differences in delivery style. We recommend watching the videos in the accompanying table.

*From:* Page MJ, McKenzie JE, Bossuyt PM, Boutron I, Hoffmann TC, Mulrow CD, et al. The PRISMA 2020 statement: an updated guideline for reporting systematic reviews. MetaArXiv. 2020, September 14. DOI: 10.31222/osf.io/v7gm2. For more information, visit: [www.prisma-statement.org](file:///D:\rama\ARTIKEL\REVIEW%20CHECKLIST\www.prisma-statement.org)