



Citing Data in IEEE

This handout includes information on how to cite raw data in IEEE format. This would be numbers in datasets or any other raw data before your source has analyzed it. This would not include someone else's representation, such as charts, or conclusions/analyses on the matter.

Principles of Citing Data

- Importance: raw data should be considered legitimate products of research, and thus be treated with the same importance in citation records as citations of other research products
- Credit and Attribution: citations must give scholarly credit and legal attribution to all involved in creating the data
- Evidence: in a scholarly work, wherever a claim relies upon data as evidence, that data must be cited
- Unique Identification: citations of each source, in this case data sets, must be distinct from citations of other sources so that it's clear where exactly each piece of data came from
- Access: citations must facilitate access to the data in a way that allows the data to be located and referenced by others
- Persistence: the identifiers for the data in the citation must remain functional to allow people to access the data in the future
- Specificity and Verifiability: citations must be clear enough that others can follow your citation to find the same data to verify you represented it accurately
- Interoperability and Flexibility: the format in which you cite your data must be standard and conform to the accepted citation style to facilitate understanding

Speaking and Writing Center [1]: Many of these points would apply to other sources that need to be cited, though these are meant to stress that raw data is still a legitimate source and thus must be cited as other types of sources.

Speaking and Writing Center [2]: This includes things such as publications, theses, and other research papers.

Speaking and Writing Center [3]: According to IEEE procedures, sources, in this case the raw data you are using, need not be cited fully in the text, though they do need to be in a references page. Refer to the general IEEE handout if you do choose to put in-text references.

Speaking and Writing Center [4]: If the dataset is online, this will likely require you to find a permanent link, so that the link will always send viewers to the same page every time it is clicked. Most databases will have an icon where you can select to copy the permalink, though the exact location varies between databases.

Speaking and Writing Center [5]: This ties into the preceding categories of Access and Persistence as well, as these all stress the importance of making sure others can access the source based on your citation.

Data Citation Formats

These citation styles would be used in the bibliography. As mentioned above, citations in IEEE often do not need to be cited fully in-text, so refer to the general IEEE handout if you are choosing to cite them in-text.



Online Dataset Reference Using a DOI

U.S. Department of Health and Human Services, Aug. 2013, "Treatment Episode Dataset: Discharges (TEDS-D): Concatenated, 2006 to 2009," U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Office of Applied Studies. [Online]. doi: 10.3886/ICPSR30122.v2.

Online Dataset Reference Using a Website Address

U.S. Department of Health and Human Services, Aug. 2013, "Treatment Episode Dataset: Discharges (TEDS-D): Concatenated, 2006 to 2009," U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Office of Applied Studies. [Online]. Available: <https://www.icpsr.umich.edu/web/NAHDAP/studies/30122/versions/V5>

Speaking and Writing Center [6]: Author, in this case the governmental agency that put the dataset out.

Speaking and Writing Center [7]: Date in the form of abbreviated month and year.

Speaking and Writing Center [8]: Title of dataset in quotation marks. Notice that all important words in the title are capitalized.

Speaking and Writing Center [9]: This is the group that distributed/put out this data, in this case a government department.

Speaking and Writing Center [10]: Since the DOI was found online, you would indicate that before providing the actual DOI. Notice that there are brackets around the word and that the word is capitalized.

Speaking and Writing Center [11]: "doi:" followed by the DOI and a period.

Speaking and Writing Center [12]: This section of the citation (author through [Online]) follows the same format as an online dataset reference using a DOI.

Speaking and Writing Center [13]: Since this has a URL, you precede it with "Available:" and then the URL as it is a URL, not a DOI.