Thank God for plagiarism: newspapers as the seismometers of the 18th and 19th centuries

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In today's world of Wikipedia, Google, tweets and turnitin.com, professors and journal editors are hard pressed to impress upon students and article writers the need for careful and religious referencing, and a bibliography. But there was once a kinder, gentler time that not only permitted plagiarism, but saw it as an essential medium to get the news out and to communicate knowledge. Prior to the start of the 20th century, newspapers are one of the best sources by which one can discover and document historic earthquakes. Indeed, well into the 1930s newspapers can serve to define felt seismic events that are not in national catalogues, or not in the early instrumental record.

One such event appeared in a March 8, 1774 Halifax newspaper, and cited an October 16, 1773 unidentified London newspaper that had arrived on a sailing vessel from Britain. The article reported an apparently tsunamiigenic earthquake in the southern Algarve Province of Portugal and in the vicinity of the Guadiana River that forms the border of southwestern Spain and Portugal. The July 27–28, 1773 event is not found in the modern seismic catalogues of Portugal or Spain.

Was it a mis-cited report of some other earlier known offshore event such as one on April 12, 1773, or even a hoax? Even though the article was brief, the descriptions of the apparent tsunami and of the seismic effects were consistent with observations that one might expect in the area, and the geographic locations reporting the events were quite real, though locations were occasionally somewhat misspelled in the English-speaking press.

Initial enquiries with Portuguese contacts yielded no confirmation of the event. Five years later a visit to the National Library of Portugal in Lisbon frustrated the writer with a seeming absence of any Portuguese newspapers from the year 1773. The data dam broke in The British Library's newspaper collection with the discovery of the probable Oct. 16, 1773 newspaper that found its way across the Atlantic where a Halifax editor reprinted a precis of the seismic and tsunami events in 1774. There were three very similar London reports that in turn came from the Amsterdam Gazette. These gave more details: “… a religious house belonging to the Dominican Friars was thrown down, as were several houses, the falling of which killed many people.” and “The vessels in the bay, ... were thrown on shore, a great number of fishing boats were thrown on the land, and several men perished.”

European colleagues have been skeptical that a brief account in a Nova Scotia newspaper some 7.5 months after the event could lead to a suggestion of a new “historical” 1773 tsunamiigenic event in the Golfo de Cadiz and now to its confirmation 237 years after a Lagos resident in the southern Algarve wrote a letter to a merchant in Rotterdam, but that reality now appears to be the case. It has also lead to the discovery of England’s second oldest apparent tragic tornado at 09:00, Sunday, Oct. 3, 1773 near York with a possible second event at 14:00 at the Trent Bridge in Nottingham.