Research Commentary—Too Big to Fail: Large Samples and the *p*-Value Problem

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Abstract

The Internet has provided IS researchers with the opportunity to conduct studies with extremely large samples, frequently well over 10,000 observations. There are many advantages to large samples, but researchers using statistical inference must be aware of the *p*-value problem associated with them. In very large samples, *p*-values go quickly to zero, and solely relying on *p*-values can lead the researcher to claim support for results of no practical significance. In a survey of large sample IS research, we found that a significant number of papers rely on a low *p*-value and the sign of a regression coefficient alone to support their hypotheses. This research commentary recommends a series of actions the researcher can take to mitigate the *p*-value problem in large samples and illustrates them with an example of over 300,000 camera sales on eBay. We believe that addressing the *p*-value problem will increase the credibility of large sample IS research as well as provide more insights for readers.

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