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Indranil Ghosh and **Ayman Alzaatreh**. *Weibull Lomax distribution: An alternative to
Weibull-Pareto distribution.*

The Lomax distribution, conditionally known as Pareto (type II) distribution, is a heavy tail probability distribution used extensively in business, economics, and actuarial modeling. In this paper we consider a new absolutely continuous distribution, Weibull-Lomax distribution, following the technique of mixing two continuous distributions. It is observed that the Weibull-Lomax distribution can provide a better fit to the data as compared to Weibull-Pareto model because of greater efficiency in estimating model parameters of the former over the later. For illustrative purposes a real life data set is considered as an application of the Weibull-Lomax model. (Received September 16, 2014)