

A Z test is a statistical tool used to compare two sets of data, while a level of significance measures the probability that the observed difference between the two sets of data is due to chance rather than a real difference. A modified Wilcoxon rank-sum test is a statistical test used to compare two sets of data without assuming normality or equal variances. Non-parametric tests are statistical techniques used to compare two sets of data without assuming normality or equal variances. An alternate hypothesis states that there is a difference between two sets of data, and the Z value is calculated as $(P1 - P2) / \sqrt{N1 + N2}$.