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EXTENSIONS OF THE INDIRECT SAMPLING METHOD AND ITS APPLICATION IN TOURISM SURVEYS

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ABSTRACT

To select a sample for a survey, such as an economic survey, we need a database that can be used to reach the target population. Unfortunately, we do not always have a list of the desired collection units. But we do often have lists of units that are connected in some way to the list of collection units. In that case, we have a situation where two populations U^A and U^B are linked by some relation. We want to produce an estimate for U^B , but we only have a sample frame for U^A . We therefore select a sample s^A from U^A in order to produce an estimate for U^B using the relationship between U^A and U^B . This is called *simple indirect sampling*. In some cases, we may want to produce estimates for population U^C , but we cannot reach it through U^B . This is referred to as *transitive indirect sampling*.

In this article, we will develop the application of this type of sampling and suggest a solution to a problem that can occur when the sample s^B is too large. Then we will see how this type of sampling applies to non-captive tourism surveys when border surveys cannot be implemented.

Reference: *Le sondage indirect ou la méthode généralisée du partage des poids*, Pierre Lavallée, Éditions Ellipses, 2002.

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