

Introduction to Household Data Analysis: Using Stata to describe, transform, and analyze data

A learning event conducted by International Food Policy Research Institute in collaboration with The Australian National University and University of Papua New Guinea

DATE – March 13th and March 17th

Port Moresby, Papua New Guinea

Training Objectives

Household and agricultural data can provide a wealth of knowledge and insights into the economic activities and welfare of rural populations. These datasets can help to answer a variety of important policy questions, such as: Which households are engaged in agriculture, and do they have additional sources of income? What share of the population is consuming a healthy diet? What are the drivers of poverty across the country? However, to answer questions such as these, it is necessary to have a firm understanding of the nature of the underlying microdata, the ways in which the microdata should be managed, and the analytical tools that can be employed appropriately.

The objective of this learning event is to provide a thorough and hands-on introduction to Stata, a powerful statistical software package commonly used to analyze household datasets and many other types of data. In this training, we will discuss how Stata can be used effectively to answer a wide range of policy-relevant questions. We will use Stata to generate descriptive statistics and tables from household surveys and agricultural data, and to begin a discussion on some statistical methods for hypothesis testing. Although this is an introductory course, we still encourage those with prior Stata experience to attend, as there will be a variety of economic analysis topics and Stata codes discussed, and any subsequent Stata training courses will build on the material covered in this introduction.

The workshop is structured around three related topics: (1) exploring datasets and describing data; (2) transforming data to achieve analysis goals; and (3) analyzing data for policy analysis.

Please note that participants must have access to a computer that can run Stata smoothly during this learning event (see [this link](#) for the computer requirements). Limited duration student licenses will be given to participants who do not already have Stata installed on their computer.

Training Schedule – March 13th (09:00 – 18:00)

Time	Agenda
8:30 – 9:00	Registration and Coffee / Tea
9:00 – 9:30	Introduction to Stata and Background of 2023 rural household survey data
9:30 – 10:30	Lesson 1 - Exploring data using Stata
10:30 – 10:45	Coffee / Tea
10:50 – 12:30	Lesson 1 – Creating and using descriptive statistics
12:30 – 13:30	Lunch

13:30 – 15:00	Lesson 1 – Usage of conditional commands to analyze data
15:00 – 15:15	Coffee / Tea
15:20 – 16:50	Lesson 2 – Cleaning existing variables and create new variables
16:50 – 17:00	Break
17:00 – 18:00	Lesson 2 – Creating useful figures and tables
18:00 – 19:00	Dinner

Training Schedule – March 17th (17:00 – 20:00)

Time	Agenda
16:30- 17:00	Registration and Coffee / Tea
17:00 – 18:00	Lesson 2 – Collapsing and merging dataset
18:00 – 18:15	Certificate Distribution Ceremony In the presence of: <ul style="list-style-type: none"> • Dr. Lawrence Sause, Acting Executive Dean, School of Business and Public Policy • Mr. Nic Jonsson, Counsellor-Economic, Australia High Commission
18:15 – 18:30	Coffee / Tea
18:30 – 20:00	Lesson 3 – Analyzing data (correlations, T-tests, Ordinary least square regressions)
20:00– 20:30	Dinner / Light Snack