STATA for Labour and Employment Research Training Course

Professional Development Training Course Outline

Category	Trade Unions	**Duration**	10 Days
Base Fee	$3,000 USD	**Delivery Mode**	Online / On-site Hybrid

Course Introduction

The global labour market is rapidly evolving under the influence of digital transformation, gig economy expansion, unemployment volatility, informality, and labour migration dynamics. To understand these shifts, researchers, policymakers, and analysts require advanced data analytics, econometric modelling, and evidence-based labour market research tools STATA for Labour and Employment Research Training Course is designed to equip participants with strong capabilities in labour statistics analysis, workforce trend evaluation, wage inequality measurement, and employment policy impact assessment using real-world datasets.

The course integrates applied econometrics, microdata analysis, labour force surveys, panel data techniques, and impact evaluation methods to strengthen research accuracy and policy relevance. Participants will learn how to analyze employment-to-population ratios, youth unemployment, gender labour gaps, informal sector dynamics, and productivity trends using Stata. The training emphasizes hands-on data manipulation, regression modelling, causal inference, and visualization techniques to produce publishable-quality research outputs for academia, government, and development organizations.

Programme Curriculum

STATA for Labour and Employment Research Training Course

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Course Duration

10 Days

Course Objectives

1. Master labour market data analytics using Stata
2. Apply econometric modelling for employment research
3. Analyze unemployment trends and labour force participation
4. Evaluate wage inequality and income distribution
5. Conduct impact evaluation of labour policies
6. Understand informal sector employment dynamics
7. Perform panel data and longitudinal labour analysis
8. Clean and manage large labour force datasets
9. Use regression analysis for employment forecasting
10. Measure gender and youth employment gaps
11. Conduct migration and workforce mobility studies
12. Build data visualization dashboards for labour statistics
13. Produce policy-ready labour market research reports

Target Audience

1. Labour economists and researchers
2. Government policy analysts (Labour & Employment ministries)
3. Graduate students in economics, statistics, and development studies
4. HR data analysts and workforce planners
5. NGOs working on employment and poverty reduction
6. International development consultants (ILO, World Bank projects)
7. Data scientists focusing on socio-economic research
8. Academic lecturers and research fellows

Course Modules

Module 1: Introduction to Labour Market Analytics

- Labour market indicators and definitions
- Employment, unemployment, underemployment metrics
- Data sources (LFS, DHS, census datasets)
- Introduction to Stata interface
- Case Study: National unemployment profiling

Module 2: Data Import and Management in Stata

- Importing CSV, Excel, and survey data
- Data cleaning and validation
- Handling missing values
- Variable labeling and coding
- Case Study: Cleaning labour force survey dataset

Module 3: Descriptive Labour Statistics

- Mean, median, dispersion measures
- Employment rate calculations
- Cross-tabulations by gender/age
- Summary statistics reporting
- Case Study: Youth unemployment analysis

Module 4: Data Transformation Techniques

- Recoding variables
- Creating dummy variables
- Generating composite indices
- Merging datasets
- Case Study: Sector-wise employment classification

Module 5: Regression Analysis Basics

- Linear regression models
- Interpreting coefficients
- Hypothesis testing
- Model diagnostics
- Case Study: Wage determinants study

Module 6: Advanced Econometric Models

- Logistic regression for employment status
- Probit models
- Tobit models
- Robust standard errors
- Case Study: Employment probability analysis

Module 7: Panel Data Analysis

- Fixed vs random effects
- Time-series cross-sectional data
- Hausman test
- Trend analysis
- Case Study: Wage growth over time

Module 8: Time Series Labour Data

- Trend decomposition
- Forecasting employment rates
- ARIMA models
- Seasonal adjustment

- Case Study: National employment forecasting

Module 9: Wage Inequality Analysis

- Gini coefficient
- Lorenz curve
- Wage distribution models
- Gender wage gap analysis
- Case Study: Gender pay gap evaluation

Module 10: Informal Sector Analysis

- Defining informal employment
- Measurement techniques
- Productivity assessment
- Sectoral comparisons
- Case Study: Urban informal labour study

Module 11: Labour Migration Studies

- Migration data sources
- Push-pull factors
- Remittance analysis
- Workforce mobility trends
- Case Study: Regional migration impact

Module 12: Impact Evaluation Methods

- Randomized control trials basics
- Difference-in-differences
- Propensity score matching
- Policy evaluation frameworks
- Case Study: Job creation program evaluation

Module 13: Survey Data Analysis

- Sampling weights
- Stratified survey design
- Survey regression models
- Error adjustment techniques
- Case Study: National labour survey analysis

Module 14: Data Visualization in Stata

- Graphs and charts creation
- Heatmaps and dashboards
- Trend visualization
- Exporting visual reports
- Case Study: Employment trend dashboard

Module 15: Research Reporting & Policy Writing

- Structuring research papers

- Policy brief writing
- Interpreting econometric results
- Data storytelling techniques
- Case Study: Labour market policy report

Training Methodology

- Interactive lectures and presentations.
- Group discussions and brainstorming sessions.
- Hands-on exercises using real-world datasets.
- Role-playing and scenario-based simulations.
- Analysis of case studies to bridge theory and practice.
- Peer-to-peer learning and networking.
- Expert-led Q&A sessions.
- Continuous feedback and personalized guidance.

Register as a group from 3 participants for a Discount

Send us an email: info@fineskilltrainingcenter.org or call *+254769199797*

Certification

Upon successful completion of this training, participants will be issued with a globally- recognized certificate.

Tailor-Made Course

We also offer tailor-made courses based on your needs.

Key Notes

a. The participant must be conversant with English.

b. Upon completion of training the participant will be issued with an Authorized Training Certificate

c. Course duration is flexible and the contents can be modified to fit any number of days.

d. The course fee includes facilitation training materials, 2 coffee breaks, buffet lunch and A Certificate upon successful completion of Training.

e. One-year post-training support Consultation and Coaching provided after the course.

f. Payment should be done at least a week before commence of the training, to Fineskill Training Center account, as indicated in the invoice so as to enable us prepare better for you.

Upcoming Scheduled Sessions

Start Date	End Date	Location	Price
23 Nov 2026	04 Dec 2026	Online	$2,000

Start Date	End Date	Location	Price
23 Nov 2026	04 Dec 2026	Physical	$3,000
23 Nov 2026	04 Dec 2026	Physical	$6,000
23 Nov 2026	04 Dec 2026	Physical	$6,000
23 Nov 2026	04 Dec 2026	Physical	$12,000
23 Nov 2026	04 Dec 2026	Physical	$9,000
23 Nov 2026	04 Dec 2026	Physical	$12,000
23 Nov 2026	04 Dec 2026	Physical	$12,000

Ready to enroll or request a customized program? Book online or contact us:

Register Online Now

Email: info@fineskilltrainingcenter.com | Website: www.fineskilltrainingcenter.com