

# **Factors that contribute to the quality of statistical work in policy and service delivery organizations**

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## ABSTRACT

This study examines the factors that contribute to the quality of statistical investigations and projects performed by statistical workers in policy and service delivery organizations (PSDOs). It also investigates the nature of statistical work carried out by these organizations, and in doing so defines the role of a statistical worker in a policy and service delivery organization.

In producing quality information, statistics play an important part in the process of transforming both qualitative and quantitative raw data into meaningful and digestible information for decision-making for individuals and organizations. There are three main types of organizations producing statistics which impact directly on the general public. They are National Statistical Agencies, international organizations and policy and service delivery organizations.

While National Statistical Agencies and international organizations have undertaken systematic quality work to identify statistical quality issues and have developed various quality frameworks, guidelines and standards, similar work has not been carried out in or on PSDOs. The key gap observed in the literature is the absence of reference to statistical work performed in PSDOs in any of the available quality frameworks. This gap prompts the research question for this study: 'What are the factors that contribute to the quality of statistical work performed by statistical workers in policy and service delivery organizations?'

Knowledge is constructed within a social context, so a thorough analysis of that context is essential to being able to evaluate the output in terms of statistical quality. This study is 'constructivist' - it places people in their social context to understand the perceptions participants have of their own activities and practices. To that end this study draws primarily on two sources of information: a series of semi structured in-depth interviews; and a self administered questionnaire survey, the results of which contributed to the questions for qualitative data collection.

Findings of this study highlight a number of factors that have a significant impact on the quality of statistical work carried out by PSDOs. These contributory factors are grouped into three broader organizational forces, and collectively referred to as S-P-T framework. Those forces are: 'Strategies, policies and frameworks', 'People' and 'Technology and technical skills'.

As the first study focused on identifying factors that contribute to the quality of statistical work performed in PSDOs, this study, which involved a significant international research component, redefines the role of statistical worker as a broker and shifts the definition of output of statistical investigations and projects from traditional outputs such as statistical reports and statistical abstracts to the construction of new organizational knowledge.

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## **LIST OF ACRONYMS**

ABS	Australian Bureau of Statistics
ADT	Attention Deficit Trait
ANT	Actor network theory
ANZSIC	Australian and New Zealand Standard Industrial Classification
ASCO	Australian Standard Classifications of Occupations
CRS	Creditor Reporting System
DAC	Development Assistance Committee
DPIS	Declaration of Principles of Official International Statistics
DQAF	Data Quality Assessment Framework
FPOS	Fundamental Principles of Official Statistics
GDDS	General Data Dissemination System
HDI	Human Development Index
HDR	Human Development Report
HDRO	Human Development Report Office
ILO	International Labor Organization
IMF	International Monetary Fund
NSA	National Statistical Agency
NSS	National Statistical Service
OECD	Organization for Economic Co-operation and Development
PSDO	Policy and Service Delivery Organization
SECI	Socialization; Externalization; Combination; Internalization
SDDS	Special Data Dissemination Standards
SSAI	Statistical Society of Australia Incorporated
TQM	Total Quality Management
UN	United Nations
UNDP	United Nations Development Program
UNSTATS	United Nations Statistics Division