



International best practices to ensure data credibility

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Overview

- | UN: Fundamental Principles of Official Statistics (1994)
- | IMF
 - SDDS
 - IMF Data Quality Assessment Framework (2003)
- | Maintaining the credibility of official statistics (2004)
- | Trust in Official Statistics (2010)
- | UNECE Work Sessions on Communication of Statistics
- | General conclusions



Fundamental Principles of Official Statistics (1994)

- | Relevance, impartiality and equal access
- | Professional standards and ethics
- | Accountability and transparency
- | Prevention of misuse
- | Sources of official statistics
- | Confidentiality
- | Legislation
- | National coordination
- | Use of international standards
- | International cooperation
- ∅ Largely compiler's view, checklist



IMF Standards for Data Dissemination (1996)

- | Enhance transparency and openness: user's view
- | Voluntary standards introduced in 1996
- | SDDS for countries that have or seek access to international capital markets
- | Over 90% of IMF membership participates incl Malaysia
- | SDDS Plus introduced in 2012 to address data gaps identified during crisis
- | Good practice in four areas
 - Coverage, periodicity and timeliness
 - Public access to data
 - Data integrity
 - Data quality



IMF Standards for Data Dissemination

- | Commitments when subscribing by countries
 - Disseminate data required by SDDS punctually
 - Publish advance release calendar
 - Provide info on metadata
 - Certify accuracy
 - Use standard electronic reporting procedures
- | IMF monitors through data module of the Reports on Observance of Standards and Codes
- | Data Quality Reference Site: stimulate dialogue and develop common understanding of data quality



IMF Data Quality Assessment Framework (2003)

0. Prerequisites of Quality
 - Legal and institutional environment
 - Resources
 - Relevance
1. Assurance of Integrity
 - Professionalism
 - Transparency
 - Ethical standards
2. Methodological Soundness
 - Concepts and definitions
 - Scope
 - Classifications
 - Basis for recording



IMF Data Quality Assessment Framework (2003)

3. Accuracy and Reliability

- Source data
- Assessment of source data
- Statistical techniques
- Validation of intermediate data and statistical outputs
- Revision studies

4. Serviceability

- Periodicity
- Consistency
- Revision policy and practices

5. Accessibility

- Data accessibility
- Metadata accessibility
- Assistance to users



IMF DQAF in practice

- | DQAF very useful framework
 - Workable definition
 - Set of best practices
- | Additional criteria for specific statistical domains (6)
- | Voluntary application to BIS statistics (2009)
- | Empirical work by IMF staff to assess information content of DQAF indicators
 - Quality differs across statistical domains
 - Quality differs across quality dimensions
 - Possible to construct index of data quality
 - Possible to maximise info content of DQAF during ROSC missions
- | ROSC starts with self-assessment: could be considered by Malaysia? Join 100 ROSCs published so far ...



Maintaining the credibility of official statistics (2004)

- | Paper by Fellegi to UNECE
- | “The goal ... must be to reach and maintain a state where the normal reaction of users ... is to assume that the data are trustworthy, objective, as accurate as the agency says they are, and therefore fit for use”
- | Credibility is a matter of perception
- | Three sets of factors have to be considered
 - Statistical factors (data quality)
 - Structural factors
 - Reputational factors



Structural factors affecting credibility

- | Meet statistical needs of the nation, not just government
- | Need to prove impartiality
- | Arm's length relationship between statistical agency and government
- | Sufficiently high hierarchical standing amongst government agencies
- | But also accountability: "If we can't trust your management, how can we trust your statistics?"
- | Importance of formal peer and institutional review
- | Reflected in some FPOS (1994), but more needed



Reputational factors affecting credibility

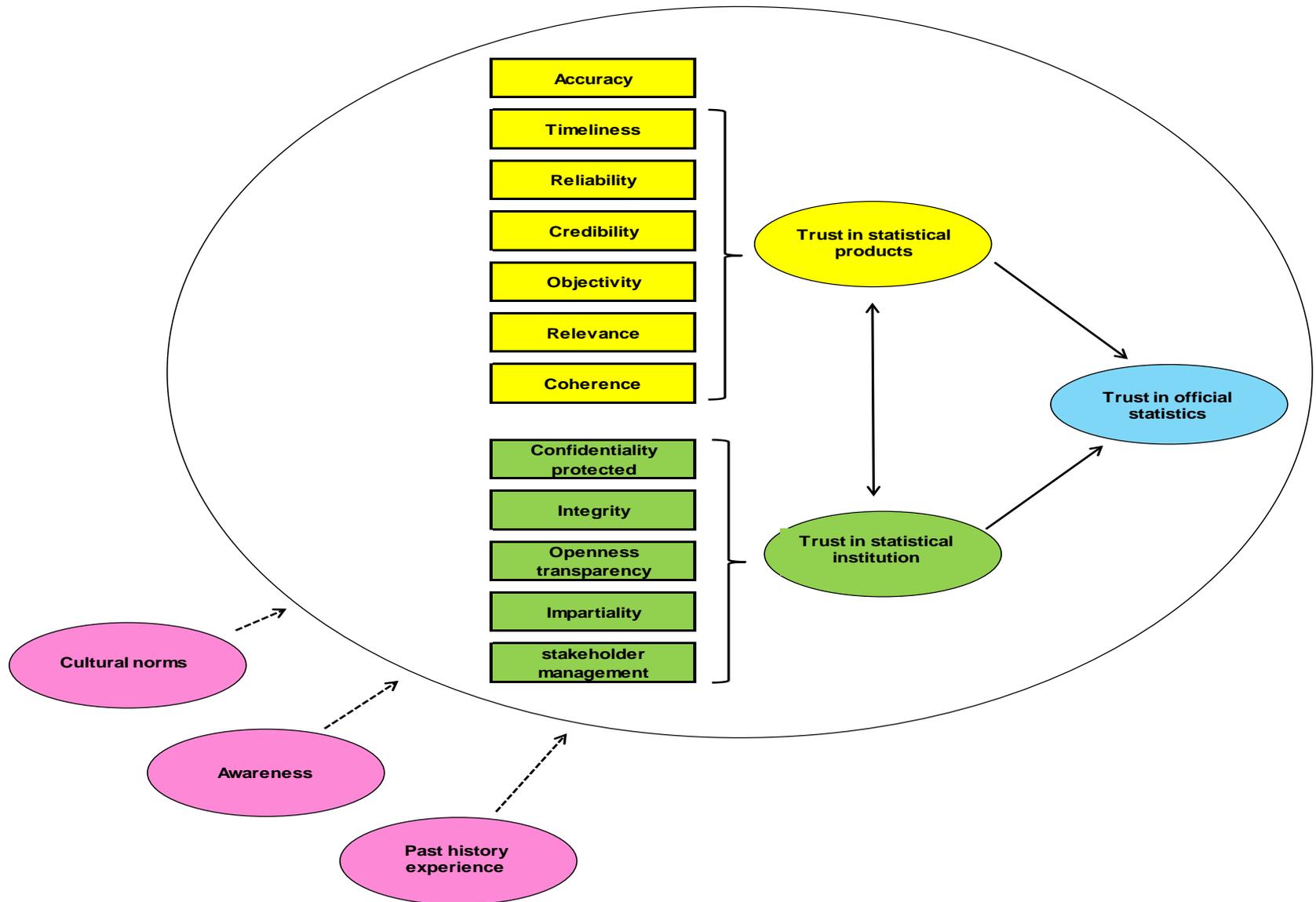
- Ø Largely focused on communications strategies and practice
 - | Keep agency in spotlight for its key data
 - | Clear media releases
 - | Respond to misinformation, misinterpretations and criticism
 - | Embed information in curricula within educational system
 - | Tailor-made information for groups of users (eg Parliament)
 - | Importance of web dissemination
 - | Value of analytic activity



Trust in Official Statistics (UNECE paper 2010)

- | Trust can be conceptualised as:
 - Characteristics of institutions which is tied to formal mechanisms such a professionalism, contracts and regulation
 - Set of individual or social expectations shared by those participating in an economic or social exchange
 - Characteristic of interpersonal relationships, dependent on the outcomes and consequences of particular actions
 - Construct which is best viewed through the lens of a set of ethical principles
- | From objective, factual approach to “soft” criteria

Framework for measuring trust in official statistics





Surveys of trust in official statistics

- | In many countries: national surveys on trust in government activities (also in Malaysia?)
- | Credibility of central banks relatively high in most cases
- | Credibility of national statistical agencies lower than central banks and differs from country to country
- | Eurobarometer surveys “How much trust do you have in the official statistics in your country, for example on unemployment, inflation and economic growth? Would you tend to trust these official statistics or tend not to trust them?”



Surveys of trust in official statistics (2)

- | Response to Eurobarometer survey (2009)
 - Less than half on average report that they trust them
 - Over 60% trust them in the Netherlands, Denmark, Finland, Luxembourg and Sweden
 - Only one out of three only trust them in UK and France
- | Survey only captures domestic views: what about perceptions abroad?
- | Recent crisis in Europe can be expected to have effect



UNECE Sessions on Communication of Statistics

- | Various recent themes a reflection of ongoing thinking on credibility and communications strategies
- | Latest meeting in June 2012, topics included
 - Knowing your users' interests
 - Engaging users with visualisation
 - Engaging with the media
 - A proactive media strategy
 - Communication with mass media
 - Using short stories, video summaries and infographics
 - Wikidata
 - From App of the Day to Yesterday's News
 - Introducing web-TV



Conclusions

- | Various efforts to spell out principles and best practices to ensure institutional commitments and data quality – hard facts, check lists, self assessments and reports
- | Credibility and trust – the importance of softer and subjective criteria
- | Importance of communication in the internet age
 - New technologies
 - Also evolving cultural norms
 - Recent experience with global economic and financial crisis will also leave a trace
 - Important to reflect on how to improve credibility (further) over time