Response rate to FAO questionnaires

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Measuring data quality

- FAO produces international statistics
- In order to do this it needs to compile, harmonize and standardize the information provided by countries
- Countries are our main source of data and as such FAO is heavily depended on the quantity and the quality of the data countries provide to us.
- Therefore, it is important to measure the level of response of the questionnaires by countries, and the level of completeness of the resulting databases with data coming from official sources.
Measuring data quality

- The Statistics Division of FAO (ESS) dispatches 6 annual questionnaires, and collects data for the following agricultural domains:
  - Agricultural Production
  - Producer prices
  - Fertilizers use
  - Pesticides use
  - Government Expenditures in Agriculture (GEA)
  - Land Use
Measuring data quality (ct’d)

- The Fisheries Division dispatches mainly 6 annual questionnaires, and collects data for the following agricultural domains:
  - Aquaculture Production
  - Capture production
  - Disposition of fishery production
  - Fleet
  - Number of fishers and fish farmers
  - Production of processed commodities
Measuring data quality

• Response rate indicator is defined here by:

\[
Response \ rate = \frac{Number \ of \ questionnaires \ filled \ (by \ year)}{Number \ of \ questionnaires \ dispatched \ (by \ year)}
\]
Measuring data quality

• Data completeness indicator is defined here by:

\[
\text{Completeness rate} = \frac{\text{Number of official data points (by year)}}{\text{Number of expected data points (by year)}}
\]

• The presentation will focus on the response indicator
Findings: The majority of the regions (except Pacific Islands) have a response rate that is above the average of the world (ESS-Questionnaires).

Average 2013-2018 response and completeness rates, by region
Findings: response rate for APCAS members is slightly below the world’s average (Fisheries-Questionnaires).

Average 2013-2018 response rates, by region
Findings: Across time there is general improvement in response rate for the ESS-AG Questionnaires

Trend of response rate: ESS Questionnaires

- Central Asia
- Oceania excluding Australia and New Zealand
- South-Eastern Asia
- Southern Asia
- Eastern Asia
- World

2013 - 2018
Findings: Across time and regions, there is a decrease in response rate for the Fisheries Questionnaires

Trend of response rate: Fisheries questionnaires

- Central Asia
- Oceania excluding Australia and New Zealand
- South-Eastern Asia
- Southern Asia
- Eastern Asia
- World
Findings: Across domains, Prices and Production had higher response rates than other domains over time (ESS-Questionnaires)

Trend of response rate by questionnaire

- Fertilizers
- Food Loss
- GEA
- Land
- Pesticide
- Prices
- Production
Findings: Aquaculture and Capture had higher response rates than other domains over time (Fisheries-Questionnaires)

Response rate APCAS: Fisheries Questionnaires
Why do we have a low or no response:

- Is it that we do not reach the countries
  - Lack of accuracy on list of relevant contact points at country level

- Is it that countries cannot report due to different reasons like:
  - Increased burden: from FAO questionnaires (length, complexity, number, etc.); from all sources (regional/international organizations, NGOs, etc.)
  - Resource limitations: lack of expertise; budget/HR constraints at country level; staff turnover/loss of experience
  - Lack of data availability: less than annual frequency, or no data collection, in some domains (though this absence should be reported)
What can we do about it?: for discussion

• To improve in the coordination mechanisms:
  • Maintain up-to-date national focal point(s) with the support of the FAO regional and country offices
  • Continue to harmonize the questionnaire dispatch

• Develop alternative data reporting/collection means
  • FAO pilots multiple-mode data collection, such as on-line questionnaires;

• Promote an open and continuous communication with the national focal point to ask for missing information or clarify doubts
What can we do about it?: for discussion

- FAO and member countries explore how best to implement statistical capacity development activities in the areas of data collection and data reporting/compilation

- Expand national data peer-review process for imputed data

- Others?
Thank you!

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