Development of Cloud Environment for Accumulation and Distribution of Analytical Information Resource on a National Scale



GTU-MICM

Hasan Kayman

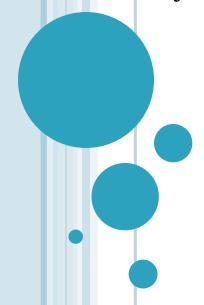
IBSU

Zurab KipShidze

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ANALYTICAL INFORMATION

- Historical
- Aggregated
- Hierarchical
- Gradually Accumulated



REQUIREMENTS TO ANALYTICAL INFORMATION RESOURCE

- Integrity
- Reliability
- Compatibility
- Security
- Acceptable Cost

CONSUMERS OF ANALYTICAL INFORMATION RESOURCE

- Governmental Institutions
- Business Groups
- Experts
- Analysts

REASONS FOR ADAPTING CLOUD ENVIRONMENT

- To ensure integrity of information resource
- To manage quality of the resource
- To reduce cost of accumulation of analytical information and knowledge
- Maintenance of long-term data archives

LIFECYCLE OF ANALYTICAL INFORMATION RESOURCE

- Resource Planning
- Primary Data Collection
- Transformation of Data into Information Resource Structures
- Delivery of Information
- Archiving

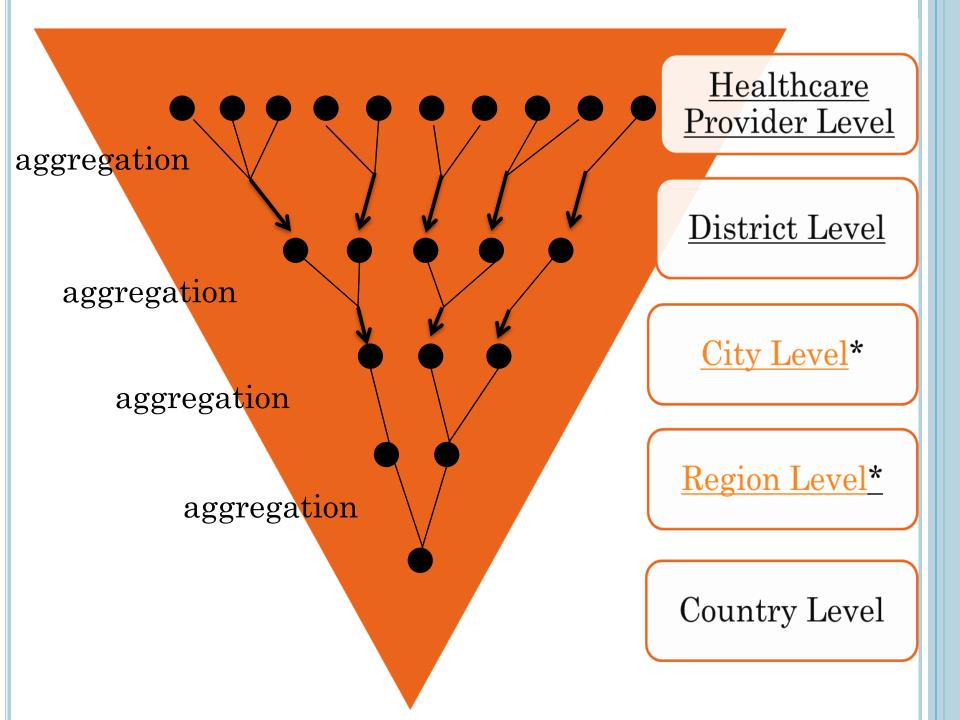
STEPS OF RESOURCE PLANNING

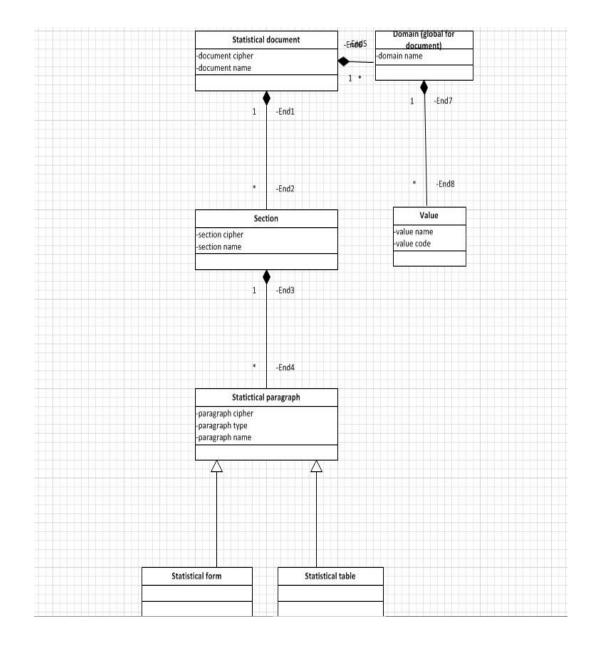
- Determining information Resource Structure
- Determining information resource content
- Defining criteria for information resource completeness, integrity and uncontradictiveness
- Revealing and classifying initial data suppliers
- Planning resources for information gathering and processing
- Determining schedule for information gathering

Analytical Information Resource Structure

(hypothetical)

- Service Provision Level
- District Level
- Community Level
- Regional Level
- Country Level





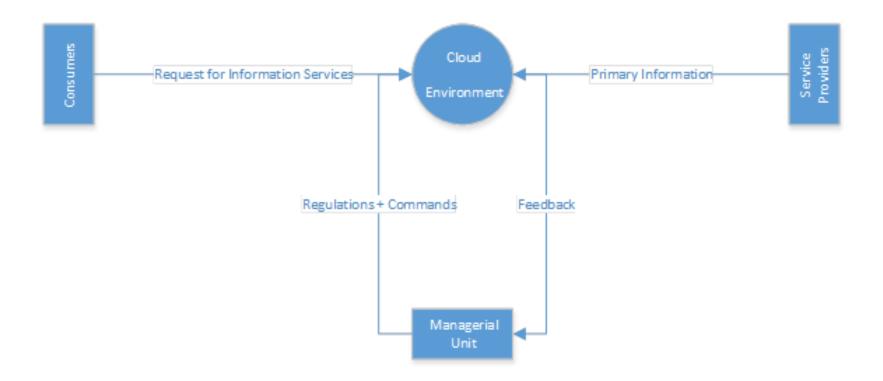
The Structure of Foundation Statistical Document

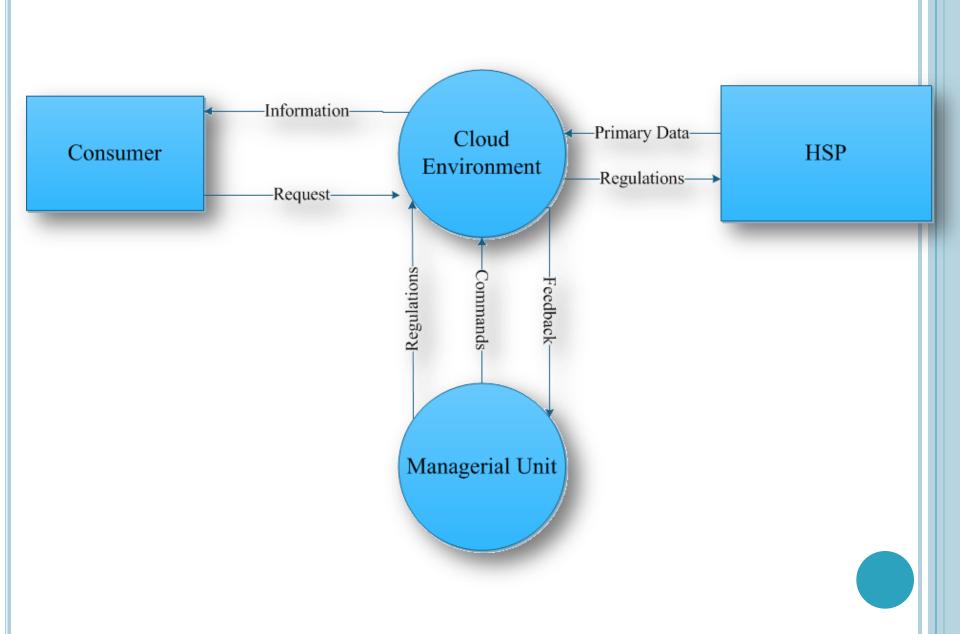
Healthcare Service Providers Classification Criteria (affordable)

- Type of HSP (hospital, pharmacy, clinic, health centers, etc);
- Ownership (private, state, etc.);
- Type of services;
- Specialization (children's, women's, general);
- Size of HSP (small, medium, large);
- etc.

REQUIREMENTS FOR CLOUD ENVIRONMENT

- To Support Several Subject Areas
- Be Configurable for Particular Subject Area
- Ensure Quality of Information Resource
- Ensure Transparency of Information Space
- Acceptable Cost for Data Processing





ARCHITECTURAL FRAMEWORK FOR CLOUD ENVIRONMENT

(according to R. Dukaric and M. B. Juric from University of Ljubljana)

- resource abstraction layer
- o core service layer
- value-added service layer
- support layer
- security layer
- management layer
- control layer

Thank You