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ESTABLISHMENT OF A BARANGAY DATABASE INFORMATION SYSTEM IN REGION 10
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ABSTRACT

In recent years, both the national and local government planners focused their development plans across sectors to maximize the use of resources. Thus, the need for small-area statistics also rises as data input for planning and project identification. Despite the increasing demand however, little has been done in the generation of information and the audacity in planning is lessened because of the scarcity and limitation of data.

This paper aims to improve sectoral planning and policy formulation at local level through the Establishment of a Barangay Database Information System specifically in Region 10. Aside from systems development, the project will also include data generation using household level data and the use of information from the Assessment and Monitoring Reports of the in-line agencies in the Region.

I. INTRODUCTION

As one steps into the portals of another age, a new demand for new level of information arises. Planners and policy makers in the government and the private sector including the academe and research institutions rely heavily on the information available. The shift in the demand for national and regional-based statistics to small-area statistics grows with time as projects are more focused on countryside development and across sectors.

In recent years, local government planners focused their development plans across sectors in the community to maximize the use of resources. Thus, the need for detailed small-area statistics also rises as data input for situational analysis, planning and project identification to meet the need of families requiring priority action and attention.

Several attempts had already been done to generate information at the local level to address the need for sectoral development since the Local Government Code was implemented way back in 1991. Due to budgetary constraints however, statistical agencies limited the generation of information at the national and regional level and estimates for variables or indicators needed are often assumed to be the same at the provincial or municipal level. Despite the fact that the National Statistics Office produces barangay based information, it is restricted to population data.

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Initiatives have been made by other statistical agencies such as the Bureau of Agricultural Statistics (BAS), Bureau of Labor and Employment Statistics (BLES), the Local Government Units (LGUs) and other Non-Government Organizations to further the production of small area statistics but no database was maintained at the barangay level.

In 1997, the Community-Based Information System (CBIS) project was implemented as one of the components of the Social Reform Agenda of then President Ramos using the Minimum Basic Needs (MBN) Approach. All MBN activities and directions were based on the information generated from the CBIS. The installation of the CBIS in Barangays was a dynamic process and required human resources to undertake the project and to sustain it through regular updating. The information serves as the tool to enable the development actors to converge their resources and to focus on priority projects to address the immediate need of the local constituents after the problems were identified. Sustaining the project however, without the financial back-up and constant monitoring from the implementing agencies was a more greater task for many barangays. The institutionalization of the project did not materialize.

Statistical information is a tool to acquaint people about the quantitative aspects of their community life and development. If no information will be available as the basis for planning at the local level, services required and development objectives will never be realized. Thus, the study of “Establishing a Barangay Database Information System for Region 10 was formulated with the following objectives:

1. To evaluate the capability of the National Statistics Office (NSO) field office in developing and maintaining a database at barangay level
2. To pilot-test a model as basis for the determination of the data gaps and evaluation what information to be generated
3. To cater the information and statistical needs of the planners and policy makers at local level

The project has three phases namely:
1. Data Banking and Analysis of Existing Data
2. Data Generation and
3. Updating and Maintenance of the Database.

This paper will present the activities undertaken and to be undertaken in establishing the barangay database for Region 10 based on the pilot-test. Although Data Gathering is currently done by the NSO field office personnel, future plans for Data Generation and Updating of the Database depends on the result of the Data Banking and Analysis of the existing information.
A. THE PILOT AREA

The pilot area is Iligan City located in Lanao del Norte province comprising 44 barangays. The province became part of Region 10 in 2002 but was originally identified as one of the provinces of Region 12. Iligan City was chosen because of the active support of the Iligan City Statistical Coordinating Council and the local government officials and the existence of information generated by barangay for the city’s Comprehensive Land Use Plan.

B. ORGANIZATIONAL SET-UP

B.1 Staff Resources/Expertise

As the major statistical agency of the government, the NSO field office staff are capable data collectors and researchers with sufficient skills in promoting and establishing linkages with the local government and in-line agencies. Regional and Provincial Staff were also trained in the use of Information Technology. With the presence of technical staff who are graduates of Computer Engineering, the region can embark on projects such as developing a database information system.

B.2 Analysis of Manpower/Personnel Involved

The project employed a total of 9 personnel, 5 from the regional office and 4 from the province of Lanao del Norte. The project is headed by the Regional Director of NSO Region 10 as the Project Manager.

Two of the provincial staff of Lanao del Norte is utilized as researchers. Once the data gathering are completed, the Provincial Head of Lanao del Norte and the Regional Statistician will analyze and evaluate the data gathered and will act as Project Specialists. One of the Regional Staff is tasked to develop the software and 2 will be utilized as data encoders.

B.3 Resource Requirements

Hardware

✓ Pentium III or higher computer workstation or alike
✓ Printers
✓ Monitor
✓ Storage devices
  o CDROM/CDWriter
  o CDs

Software

✓ Microsoft Access
✓ Interface software to access, process and retrieve data from the database
C. TOOLS FOR SYSTEMS DEVELOPMENT

C.1 The Database Software

A combination of the interface software and a database software will be used for the system designed to have an access to the barangay profile, the barangay maps and the database. A small-scale database software called Microsoft ACCESS will be used to store and retrieve the data by barangay while a web-based technology interface utilizing Microsoft Internet Explorer interface software will be used to gain access to all the desired data or information.

C.2 Functional Effectiveness of the Software
- Gives visual access to data since the system takes full advantage of the graphical power of windows
- Useful tool for data navigation (querying and connective capabilities)
- Help produce sophisticated, effective forms and reports
- Automate tasked easily

D. SYSTEMS DEVELOPMENT

D.1 Data Banking

The City of Iligan is piloted to evaluate the viability of the project. Existing information from the National Statistics Office on barangay level, data from other statistical or data producing agencies and the local government unit will be gathered by the field personnel of NSO, Lanao del Norte. The adequacy of the information will be evaluated and analyzed to determine what data will be included in the database and what will be generated in the future. Discrepancies of the information will be noted especially if the information is both gathered by the LGU and the national agencies concerned. Information from the barangays maintaining the MBN-CBIS will also be included in the data set.

Data generation by barangay was initially done by the City Planning Office of Iligan in 2003 to support of their Comprehensive Land Use Plan. The information generated will be included as one of the input to this project. The information collected from the field becomes part of the existing database information system of Iligan City.

D.1.1 Field Verification
The discrepancies noted becomes a subject for field verification. Variation in the base year used by the data producing agencies will be specified if the base year considered in the database is not consistent.
D.1.2 Data Encoding and Conversion

Feedback from the researchers revealed that data generated by the LGU and other agencies were mostly in EXCEL format. After the verification, copies of the information will be forwarded to the regional office for encoding and conversion to the database.

D.1.3 Evaluation of the Database System

A test run of the database information system is necessary before it will be installed for use by the researchers. It will be conducted with the presence of some Regional and provincial staff. Assessment of the system will be done to be assured of its capability.

D.1.4 Launching/User’s Orientation

To convince the users of their support, launching of the database information system will be conducted in both the Regional Office and the province of Lanao del Norte. During the Launching and User’s Orientation, feedback will be gathered to assess their data needs as well as the use of the system.

D.1.4 Training of Project Staff

The project personnel will be trained on the basic concept of the software and be able to assist researchers and other data users in the region and the province of Lanao del Norte. They will also be taught how to update the system whenever data are available.

D.2 Data Generation

At this level, the two types of data generation will be considered. Data generation inherent to agencies and the conduct of data generation based on a Household Survey by barangay. Data generation inherent to agencies is much easier to collect since it is part of their monitoring activity. Generation of other information from the households requires monetary allocation. In support to the project, a project proposal was prepared by the NSO staff and was submitted to the National Economic Development Authority (NEDA) Region 10 last March 2004 and becomes part of Region 10’s Compendium of Proposals for possible funding. Another proposal was prepared for the Local Government of Iligan City as a pilot area.

D.3 Updating and Maintenance of the Database

For the end users to value the database information system, constant updating will be done. The frequency and availability of information however, will depend on the commitment of the project staff to maintain the system. Collection or
gathering of information from Monitoring or Administrative Reports will be done on a regular basis. An assessment will also be conducted as to the access of data, the frequency of updating and the problems encountered by the staff, the sources of information and the end-users as well.

E. ISSUES, CONCERNS and SUGGESTIONS

E.1 Need for Financial Back-up

Financial support from the funding agencies and the local government units is necessary specifically for the data generation activities and maintenance of the database.

E.2 Barriers in the Establishment of the Database

One of the major activities to be undertaken in establishing a barangay database information system is data generation. This activity requires household visits to every barangay to gather the information needed from the households. Aside from the financial constraints, some of the barriers identified in gathering the information needed are the following:

1. Unfavorable political intervention
2. Physical or environmental condition such as weather, terrain, etc.
3. Worsening peace and order condition in the locality
4. Availability of the copy of information generated by the Population Commission (POPCOM), Department of Interior and Local Government (DILG), Department of Agriculture (DA), Department of Agrarian Reform (DAR) and other data producing agencies based on their Field Monitoring Reports.

These identified barriers could cause delay in the data gathering activity and in turn affect the timetable of the project. Coordination efforts with the local government officials specifically the barangay chairperson and the Barangay Council will be enhanced to overcome these barriers. The proponent will also seek the help of the Barangay Health Workers (BHWs) and the Barangay Secretaries in gathering the information since they are already familiar with the barangay. The office will also seek the help of the C/MCRS in each city/municipality to supervise the activity as well as the organization of the Barangay Secretaries. Under the Local Government Code, Barangay Secretaries are mandated to assist the City/Municipal Civil Registrars (C/MCRs) in implementing the Civil Registration Law. For POPCOM, DILG, DAR, DA and other data producing agencies, a Memorandum of Agreement could be arranged between NSO and these offices for a copy of the Field Monitoring Report.
E.3 LGU to gather Information needed

Due to financial constraints, the information generated by statistical agencies is limited. Disaggregation at the barangay level are usually not available from survey results. The use of administrative reports from the LGU at barangay level can be used as one of the basic input in the database information system. Local Government Units needs to allocate some amount for data gathering and collection of administrative reports at their own level. The information can be updated by “Purok” and consolidated for planning purposes. LGU can also seek the technical support of the Statistical Agencies in preparing the survey or administrative forms needed in gathering the indicators or information they want.
REFERENCES

PAPER/STUDY


WEBPAGE/WEBSITES
