

Code: WIS-Conf2

DEVELOPMENT OF A NATIONAL WATER INFORMATION SYSTEM: JORDAN EXPERIENCE

Bany-Mustafa Mohammed

Abstract:

A review of the current situation of water related information systems within different stakeholder organisations in Jordan, design a comprehensive National Water Information System (NWIS) and annexed Road Map/Action Plan and prepare the needed tender documents for the implementation of the NWIS

The impact of the implementation of NWIS will be increased data reliability, better data and information for the NWMP, improved data exchange between stakeholders, improved production and assessment of key indicators for the decision-makers.

Preliminary findings

Investigation of all relevant stakeholders data flow processes from the source to their final output (management and other reports). The idea of setting-up a National Water Information System as a shell on top of the existing information systems within the different stakeholder organisations, which would enable a smooth, efficient and effective exchange of data between the stakeholders was also discussed and received positively by all stakeholders.

The shell will not enable unlimited access to all available data for everyone, but that user name/password protected access will be provided on a selective basis to be negotiated with all stakeholders.

There is a data quality problem in most information systems which needs due attention. Some aspects of this are actually being improved now, such as the effort of MoWI to upgrade its monitoring system with support of KfW. Much remains to be done however.

The present WIS in MoWI is largely ineffective. This has to do with:

- Inappropriate design of the database not covering actual needs; the database was originally designed for storing monitoring data and its functions have been extended without the required evolution of database structures;
- Lack of quality control; there are many instances on the way from collecting data in the field towards their final position in the database where quality control can be improved;
- Lack of staff: The WIS is severely understaffed; and
- Inadequate organisational arrangements; this refers mainly to unclear responsibilities between business and IT staff.

A complete re-engineering of WIS (different data models for different types of data) is necessary to make it functional. This includes design, procedures and others. Moreover, the system is severely understaffed and organisational responsibilities (in particular between IT and business experts) need to be clarified.

It is also estimated that when the WIS in MoWI does not become functional, NWIS remains a utopia. The relevant stakeholders will not see any advantage in joining a system that does not provide them with adequate water sector information.

Keyword :MoWI, JVA, WAJ, water companies, MoA, MoE, MoH, RSS, JMD, DoS, LSD, RJGC