

CUSTOMER ORIENTED DEVELOPMENTS IN POLISH CADASTRE

ROZWÓJ POLSKIEGO KATASTRU I JEGO UKIERUNKOWANIE NA POTRZEBY KLIENTA

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Introduction

There have been many developments in the Polish cadastre during the last few years. These developments were part of the projects initiated by the State and Local Government agencies and institutions and were funded from a variety of sources including EU Phare and World Bank grants, and bilateral agreements with Foreign Governments.

It is interesting to observe that most of these developments were oriented toward improving services to customers. Some improvements were coming naturally from the usual conversion of manual systems to computerized ones and some systems were designed toward providing more sophisticated services to public within the information society framework and within *e-Government* project. The latter developments are presented in the paper.

Legal Regulations for *e-Government* and *e-commerce* in Poland

In Poland, the following Acts of Parliament constitute the most important body of law dealing with *e-Government* and *e-commerce*:

- Civil Code, including recent changes of 14 February 2003,
- Electronic Services Act of 18 July 2002,
- Electronic Signature Act of 18 September 2001,
- Protection of Databases Act of 27 July 2001,
- Protection of Personal Data Act of 17 June 2002,

- Electronic Payments Act of 12 September 2002,
- Protection of Selected Services and responsibility for Damage Caused by Dangerous Products Act of 1 July 2000.

The above legal regulations, discussed in depth in a separate paper (Szmajda, 2004) constitute only one component of the whole legal framework for *e-Land Administration*. The second component consists of specific legal regulations governing land administration. These regulations deal with two separate but interlinked subjects: cadastre and land registration. The legal issues related to cadastre are regulated primarily by:

- Geodesy and Cartography Act of 4 June 1989, and the associated Executive Orders.
- The legal issues related to land registration are regulated mainly by:
- Land Books and Mortgage Act of 6 July 1982, and the associated Executive Orders.

Realization of a move from traditional land administration to *e-Land Administration* requires substantial changes to existing law, and specifically, to the acts dealing with functioning of cadastre and land registration registers and systems and also to the acts dealing with the institutions responsible for these registers. The necessary changes to the legal regulations governing land administration are discussed further in section on “Organizational and Institutional Changes”. However it should be mentioned here that processes required to implement such changes are usually protracted and bitterly opposed by groups of professionals with vested interests affected by the proposed changes.

Nonetheless even the best law for *e-Land Administration* passed through the Parliament does not guarantee the practical successes during its implementation. It is necessary to have the resolve of Government and financial support for practical implementation of projects related to *e-Government*. Strategy in this respect has been recently approved by the Polish Government (Gov. of Pol., 2003). One of the statements contained in that document declares for example that:

It is necessary to coordinate creation and functioning of key databases and registers in public administration related to ... information on properties...from the point of view of providing...modern methods of access to public registers and spatial references of information contained in various databases.

Another example of such Government resolve is draft of Informatization of Public Administration Act, expected to be passed through the Parliament shortly.

Current Developments in *e-Land Administration* in Poland

Currently, three independent public registers supervised by three separate Ministers handle land administration in Poland:

- Land and Building Register (Ewidencja Gruntów i Budynków – physical cadastre) operated by Local Government Administrations (LGAs) and supervised by the Surveyor General located within the Ministry of Infrastructure,
- Land and Mortgage Register (Księgi Wieczyste – legal cadastre) operated by courts and supervised by the Ministry of Justice, and

- Property Tax Register (Rejestr Podatków od Nieruchomości – fiscal cadastre) operated by Local Government and supervised by the Ministry of Finance.

Such situation is far from being satisfactory. The major problems relate to duplication of data, insufficient communication and coordination of activities of various Government institutions involved and a sectoral approach to the legal regulations. To alleviate these problems, Polish Government has embarked on extensive programme of new developments in the domain of *e-Land Administration*. The major developments cover implementation of Integrated Cadastral System (ICS) built within three projects co-financed by EU (Phare 2000 project), World Bank (IDF project) and the Netherlands' Government (MATRA project). Large R&D projects co-financed by the Polish Science Research Council, such as project KASKADA and RSIP are providing additional experience and input. Some of these projects aim to gradually improve the current situation but others, like IDF propose more radical changes:

- The Phare 2000 project is building modern technological framework within the existing institutional setup with only minimal legal changes to allow implementing *e-procedures* (eg. land book migration, central database, etc).
- Another technology based MATRA project deals with modernization of IT systems for management, processing and access to data within the physical cadastre.
- In parallel, IDF project is defining organizational, institutional and legal changes necessary for implementation of real customer-oriented *e-Land Administration*.

Technological Framework for *e-Land Administration*

Current developments related to building the first stage of the technological platform for *e-Land Administration* in Poland concentrate predominantly within the EU Phare 2000 project. These developments are described in detail in a separate paper (Garstka, 2004). The project consists of three main components: (1) an Integrating Electronic Platform (IEP), (2) a New Land Book (NLB) and (3) an improved fiscal cadastre. The IEP provides facilities for exchange of data between all three public cadastral registers (physical cadastre, legal cadastre and fiscal cadastre) and central replicated database of physical cadastre for improved access to cadastral data. The NLB system (legal cadastre), when implemented, should provide central database of Land Books and fully electronic property rights registration in 320 courts. The third component (fiscal cadastre) shall eventually provide solutions supporting improved land and property tax collection in 2500 municipalities.

The ICS IT solutions developed within Phare 2000 project illustrated in Fig. 1 below have been designed for implementation within the existing institutional and organizational setup. Such implementation requires only minimal changes in the existing law and therefore it was possible to map the new IT facilities directly on the existing institutional structure of land administration in Poland.

These assumptions and the IT solutions for the ICS Integrating Electronic Platform (ICS-IEP) and all three ICS registers have been tested in 6 pilot LGA districts, 25 courts with 5 land book migration centres, and 7 municipalities. Much wider operational deployment of these solutions is being conducted within the next stages of the project covering Phare 2001 and 2003 programmes.

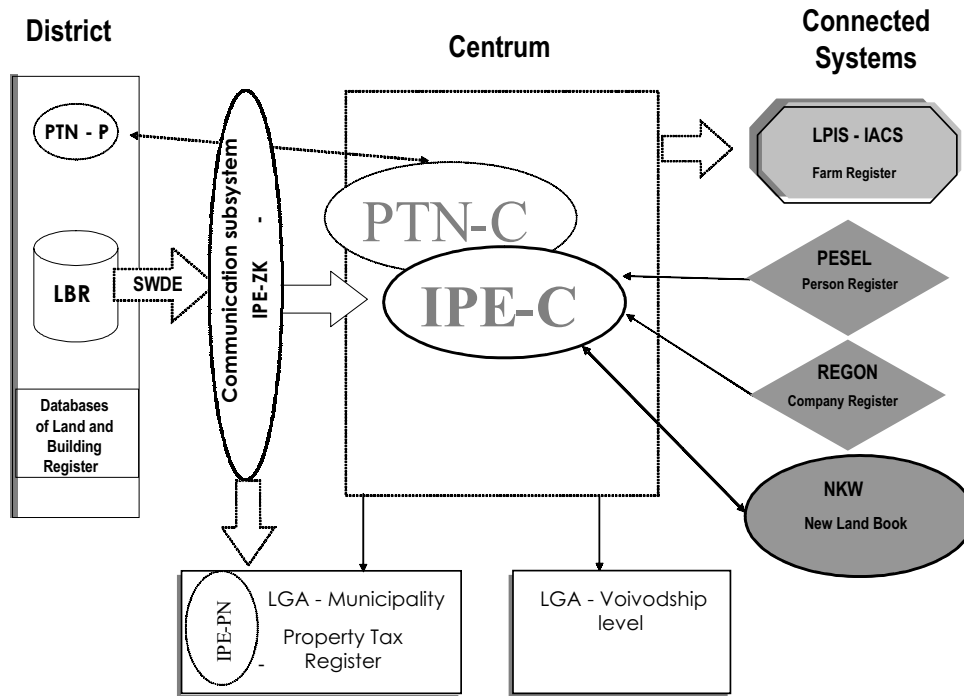


Fig. 1. Architecture of ICS-IEP system

It is planned that by the end of 2006, the ICS IT solutions for the physical cadastre shall be implemented in over 230 LGA districts out of a total of 380. The new IT solutions for the legal cadastre (the New Land Book system) shall be implemented in approximately 110 courts out of a total of 320. It is also expected that large number of municipalities out of 2500 will move to the new solutions for the fiscal cadastre.

The IT solutions developed within the Phare 2000 project are being supplemented by the MATRA project. The project is proposing alternative technological solutions for the Land and Building Register (LBR) storing and processing physical cadastre data. The proposed technical changes to the functioning of LBR are based on replacement of 380 local LBR databases with 16 regional databases. Functionality and procedures of the new IT environment of the LBR would remain virtually unchanged, with the cadastral services being handled as usually by the Geodesy Offices located in LGA at the district level. Obviously countrywide implementation of the MATRA IT solutions, once they are tested and proved, would be a substantial undertaking, which would require replacement of various LBR software packages in nearly all District Geodesy Offices and performing the associated data conversion.

Additional experience and input into development of the technological framework for *e*-Land Administration has been provided by several large R&D projects co-financed by the Polish Science Research Council. The most important of them were the KASKADA and RSIP (Sambura, Kudla, 2002) projects.

The KASKADA project resulted in an IT system providing facilities for integration of data from three registers (physical cadastre, legal cadastre and fiscal cadastre) in one database. The practical implementation of the system in three large LGA districts (Cracow, Bytom, Zgierz) has proved existence of many benefits of such integration, including the ability to provide complex cadastral data to a diverse group of customers.

The RSIP project was dealing with implementation of a model for regional Spatial Data Infrastructure (SDI). One of the important aspects of the project was issue of standardization of spatial data and metadata, including cadastral data. Other aspects of the project included provision of solutions to efficient access to spatial data from various categories of customers. The lessons from the RSIP project underline the importance of treating cadastral systems and data as essential parts of SDI. The reverse relation is equally important – cadastral systems such as Polish ICS to be able to be a part of SDI must be compatible with the SDI standards.

As the Phare 2000 project is primarily oriented toward technological solutions for ICS, it was not possible to fully achieve the wider objective of the project defined as

Improving efficiency of public bodies in the field of registration of real estate property rights and providing complex information about real property for legal, commercial and fiscal purposes.

Similarly, the IT solutions alone could not enable realization of other important goals of the ICS such as:

- creation of conditions for rational administration of land resources including optimal management of real estate and improvement of investment processes,
- stimulation of real estate market development,
- enhancement of the role of land title registration and improvement of court operation in relation to securing rights to real estate, including rights of all parties participating in real estate transactions,
- creation of conditions for rational management of property tax systems,
- activation of capital embedded in real estates,
- generation of income from facilitating access to cadastral databases.

Organizational and Institutional Changes

Introduction of a modern IT systems into existing inefficient organisation of land administration in any country is going to bring only marginal efficiency gains (as pointed out in the previous section), and probably is not worth the investment of large amounts of funds. Poland is not different in that respect. Being aware of this problem, Polish Government has created Inter-ministerial Committee for Preparing Governmental Programme for Development of Cadastral System and accepted assistance of the World Bank in the form of an Institutional Development Fund (IDF) project. The project titled “Strengthening of the Processes of Land Administration and Registration in Poland” is being conducted concurrently with the Phare 2000 and MATRA projects.

The main objective of the IDF project was to prepare the recommendations regarding the preferred model of the Integrated Cadastral System (ICS) in Poland (further called the National Framework for ICS). To achieve this objective, the project activities were conducted within the following main components of the project:

- Development of a National Framework for Integrated Cadastral System (ICS) in Poland including organizational, economic, technical and legislative aspects.
- Evaluation and recommendation of data management models and technical standards for ICS.
- Conducting operational trials in selected cities to verify concepts, recommendations and standards developed within the project.
- Development of ICS implementation models on the level of administrative districts and municipalities/ communes.
- Conducting a series of seminars on the subject of development and implementation of ICS in Poland and preparation of the final project report.

All these components resulted in important conclusions and recommendations. The most important were the results of the first component related to the preferred model of the Integrated Cadastral System in Poland and the issues of organizational, institutional and legal changes necessary for implementation of such a system as a part of *e-Land Administration*.

The main recommendations of this component of the IDF project point out the necessity of transferring cadastre and land registration systems from the jurisdiction of two ministries into one independent administrative agency (SCC, 2004). The IDF project in Poland, by making such recommendations is being in agreement with recommendations of numerous World Bank sponsored projects arguing in favour of a unified administrative registration system. The organizational and financial solutions for a National Cadastral Information Agency have been proposed and institutional and legal changes necessary for such a move were also defined. Considering sensitive issues involved in implementation of the proposed changes and the expected resistance of some groups with vested interests in maintaining the status quo the implementation plan proposes several steps toward achieving the preferred model of the ICS in Poland and not a “big bang” approach.

Among the important results of other components of the IDF project are the recommendations for introduction of new standards for cadastral data and metadata (Miksa, 2004) and (Bajorski, 2004), as well as new approach to licensing data use and payments for data access over Internet (Matela, 2004). It is sufficient to say that recommendations for both the standards and data licenses follow closely the concepts and recommendations of the INSPIRE project.

Toward *e-Conveyancing*

The IDF project also proposes a path toward implementing a more Customer-oriented cadastre. This in particular involves move toward *e-conveyancing* based primarily on strengthening the traditional role of public notaries in the conveyancing process. This could be achieved by changes in procedures combined with technological changes in the public notaries’ offices. The proposed procedure is illustrated in Fig. 2 below.

Currently, it is a duty of both the seller and buyer to conduct the searches in the cadastre and the land titling systems and provide the Notary with the appropriate documents. Information from these documents are then rewritten into the Notary act containing the contract for transfer of ownership and the application to the court for the entry into a land book. In the proposed

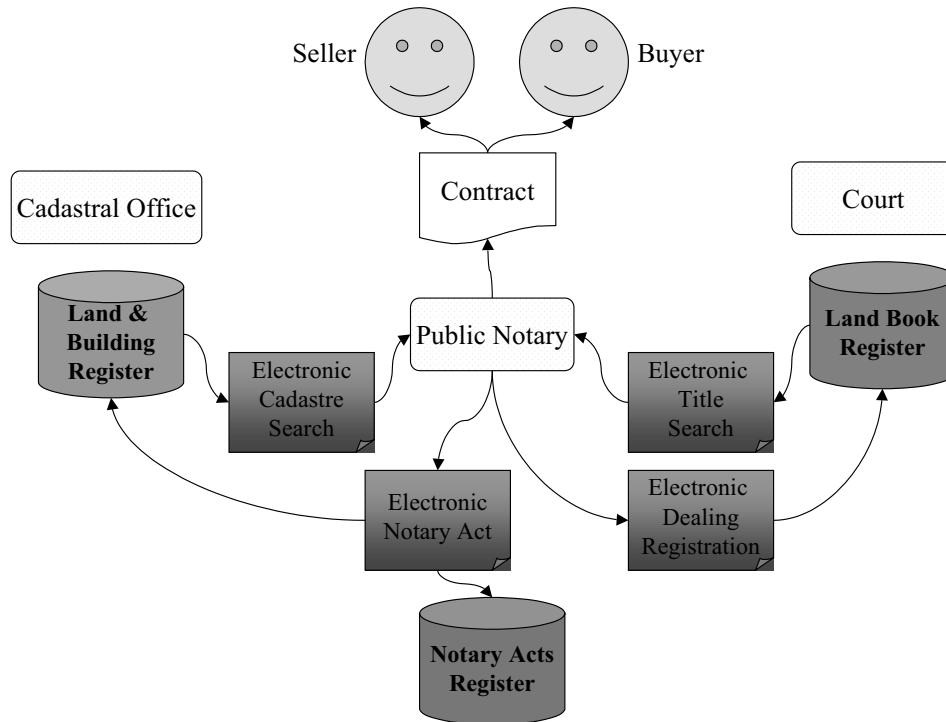


Fig. 2. Toward *e*-conveyancing

new *e*-conveyancing procedure, it would be a duty of a Notary to extract electronic version of the cadastre and titling search and include the relevant information without rewriting directly in the electronic Notary act. The act would then be immediately registered in the New Land Book system and stored in an electronic repository of all Notary acts. Implementation of such procedure requires only minor changes of the existing law.

It is interesting to observe that introduction of the proposed form of *e*-conveyancing shall also increase substantially the security of conveyancing transactions in Poland. Presently, due to the possible delays of up to a week in registration of a transaction for transfer of ownership by the notary at the court, dishonest seller can sell a property several times using different notaries. With the new electronic procedure and immediate registration of the transaction such fraud becomes virtually impossible to perpetrate.

Summary

In summary it can be stated that a lot has been achieved on Poland's road toward implementation of *e*-Land Administration, even if one cannot point to the fully operational examples of the relevant *e*-procedures.

The first stage of the technological platform for *e*-Land Administration in Poland based on the EU PHARE 2000 project solutions is already in place in 6 Local Government Administrations

(LGAs) districts and 25 courts. By the end of 2004 these numbers shall increase to 49 LGAs and 59 courts. Polish Government and the European Commission have both approved the Programme and the Business Plan for the development of the ICS in Poland providing financial security for the project.

In a concurrent World Bank IDF project a blueprint for the necessary organizational, institutional and legal changes has been worked out and the creation of an independent administrative agency recommended. Such a National Cadastral Information Agency should be responsible for conducting all the procedures of *e-Land Administration*. The new procedures and appropriate standards have been proposed. Part of these new proposed procedures covers a simple version of *e-conveyancing*, which should not only improve the service to the customers but also substantially increase the security of conveyancing transactions in Poland.

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STRESZCZENIE

Referat poświęcony jest rozwojowi elektronicznych systemów administrowania nieruchomościami (e-Land Administration), będących jednym z elementów budowanego w Polsce systemu e-administracja (e-Government).

We wstępie, referat przywołuje ustawy i regulacje prawne istniejące w Polsce, odnoszące się do elektronicznych systemów komunikacji w zastosowaniu do administrowania nieruchomościami, ustanowione z uwzględnieniem prawa obowiązującego w Unii Europejskiej. Polskie prawo administracyjne i gospodarcze jak również jego elementy odnoszące się do e-administracji i e-handlu (e-Commerce) jest sformułowane przez wiele ustaw państwowych oraz przez jeszcze liczniejsze towarzyszące ustawom przepisy i zarządzenia. Na podstawie analizy istniejących w Polsce uwarunkowań, przedstawiono strategię działań zmierzających do wdrożenia projektów związanych z realizacją idei e-administracji, które zostały zatwierdzone przez Rząd Polski.

Na tle sytuacji prawnej opisano aktualny stan praktycznego zastosowania e-obrótu nieruchomości (e-Land Administration) w Polsce. Najważniejsze z tych zastosowań są częścią Zintegrowanego Systemu Informacji o Nieruchomościach (ZSIN), budowanego w ramach trzech projektów współfinansowanych przez Unię Europejską (projekt PHARE 2000), Bank Światowy (projekt IDF) i Rząd Holenderski (projekt MATRA). Ponadto, projekty badawczo-rozwojowe, takie jak projekt KASKADA czy RSIP, współfinansowane przez Komitet Badań Naukowych wnoszą znaczące doświadczenie i praktyczne rozwiązania do stosowania elektronicznych systemów administrowania nieruchomościami. Przeprowadzono również analizę i ocenę powyższych projektów pod względem ich podejścia do zagadnień elektronicznej komunikacji i budowania odpowiedniej struktury technologicznej, proponowanych rozwiązań organizacyjnych, instytucjonalnych i zmian prawnych oraz uwzględnienia w usługach katastralnych potrzeb klientów, ze specjalnym uwzględnieniem możliwości przeprowadzania transakcji obrotu nieruchomościami drogą elektroniczną.

W pierwszej kolejności poddany jest dyskusji projekt PHARE 2000, który koncentruje się przede wszystkim na budowaniu pierwszego etapu platformy technologicznej dla e-obrotu nieruchomości. Projekt zawiera trzy główne elementy: (1) Integrującą Platformę Elektroniczną (IPE), (2) Nową Księgę Wieczystą (NKW) i (3) usprawniony system podatku od nieruchomości. IPE ma za zadanie umożliwić wymianę danych pomiędzy wszystkimi trzema publicznymi katastralnymi rejestrami (Ewidencja Gruntów i Budynków – kataster nieruchomości, Księgi Wieczyste – kataster prawny, Rejestr Podatków od Nieruchomości – kataster fiskalny) i centralną bazą danych replik Ewidencji Gruntów i Budynków w celu ułatwienia dostępu do danych i informacji katastralnych. System NKW pozwala na w pełni elektroniczną rejestrację praw własności. System dla katastru fiskalnego ma usprawnić zbieranie podatków od nieruchomości. Projekt MATRA uzupełnia projekt PHARE 2000 przygotowując bazę i projekt pilotowy wdrożenia zmodernizowanych rozwiązań technologicznych dla katastru nieruchomości. W referacie zaproponowano zmiany w Ewidencji Gruntów i Budynków usprawniające obecne funkcjonowanie Ewidencji.

Następnie poddano dyskusji zagadnienia związane ze zmianami organizacyjnymi, instytucjonalnymi i prawnymi warunkujące pomyślne wdrożenie elektronicznych technik w administrowaniu nieruchomościami, które są opracowywane w projekcie IDF równolegle z projektami PHARE 2000 i MATRA. Podstawowe zalecenie projektu IDF wskazuje na konieczność przeniesienia katastru nieruchomości (EGiB) i ksiąg wieczystych pod zarządek jednej niezależnej jednostki administracyjnej. Zaproponowano również organizacyjne, instytucjonalne i prawne zmiany niezbędne do realizacji e-obrotu nieruchomościami. W rezultacie doświadczeń z wykonanych projektów i wdrożeń przedstawiono propozycje standardów dla danych katastralnych i metadanych jak też podejście do licencji na użytkowanie danych oraz do ustalania opłat za dostęp do danych poprzez internet. W projekcie IDF opracowano strategię wdrożenia systemu katastralnego przyjaznego dla klientów uwzględniając potrzebę przeprowadzania transakcji obrotu nieruchomościami drogą elektroniczną poprzez wprowadzenie informatyzacji biur notarialnych i innych rejestrów publicznych takich jak np., Rejestr Aktów Notarialnych. Na zakończenie, podsumowane zostało zaawansowanie Polski we wprowadzaniu nowoczesnych technologii w administrowaniu nieruchomościami.

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