

# N-VIS

In 1997, as part of our consulting services, we began activities with the Slovenian Foreign Ministry – preparing an overview of the situation and defining requirements involving the new Slovenian visa information system. In 1998 the company Tris A (which merged with the SRC Group in 2005) developed a new system, VIZIS, which was implemented in the first Diplomatic Missions and Consular Points (DMCPs) of the RS abroad (the first pilot installation was done at the consulate in Trieste).

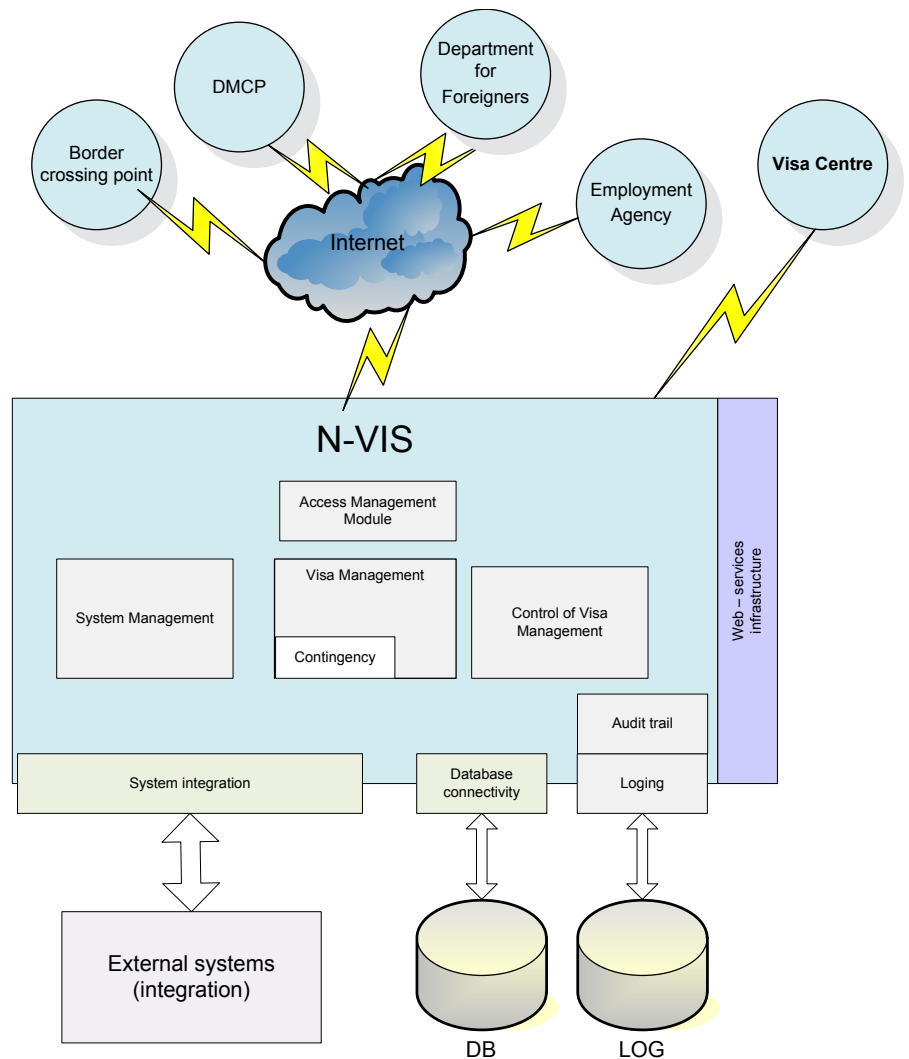
The VIZIS system is based on Lotus Notes/ Domino, which in itself supports a distributed structure - during the system development stages and at the start of the new millennium, telecommunication connections with most cities hosting Slovenian DMCPs were still limited and unreliable. This made the system's distributed structure critical to its successful operation - especially considering the requirement to minimize communication costs (this ruled out the possibility of building or leasing a proprietary network). The distributed system structure allows each DMCP to work independently, even when the connection with the central unit (Foreign Ministry) is down, and the system ensures two-way data exchange once the lines come back up (replication). Introduction of the VIZIS system was very well-accepted and by 1999 almost all Slovenian DMCPs were included in the system. During Slovenia's EU accession period the system was rated one of the best in Europe and presented one of Slovenia's advantages in the accession process (in the presentation of VIZIS - Lotus in 2002, in Kranjska Gora, Mr. Andrej Šter quoted the following citations:

- PHARE Horizontal Programme Report, Brussels, May, 29th 2002: "... The VIZIS-system, the level achieved in the field of document-security, the level of approximation on visa-practice and the co-operation between the uniformed police and the relevant authorities within the MFA is exemplary and basically does qualify Slovenia as partner ready for implementation already today. ..."
- Peer-review-mission report to European Commission, July, 7th 2002: "... The implementation-capacity of the MFA is remarkable. Not very many questions were

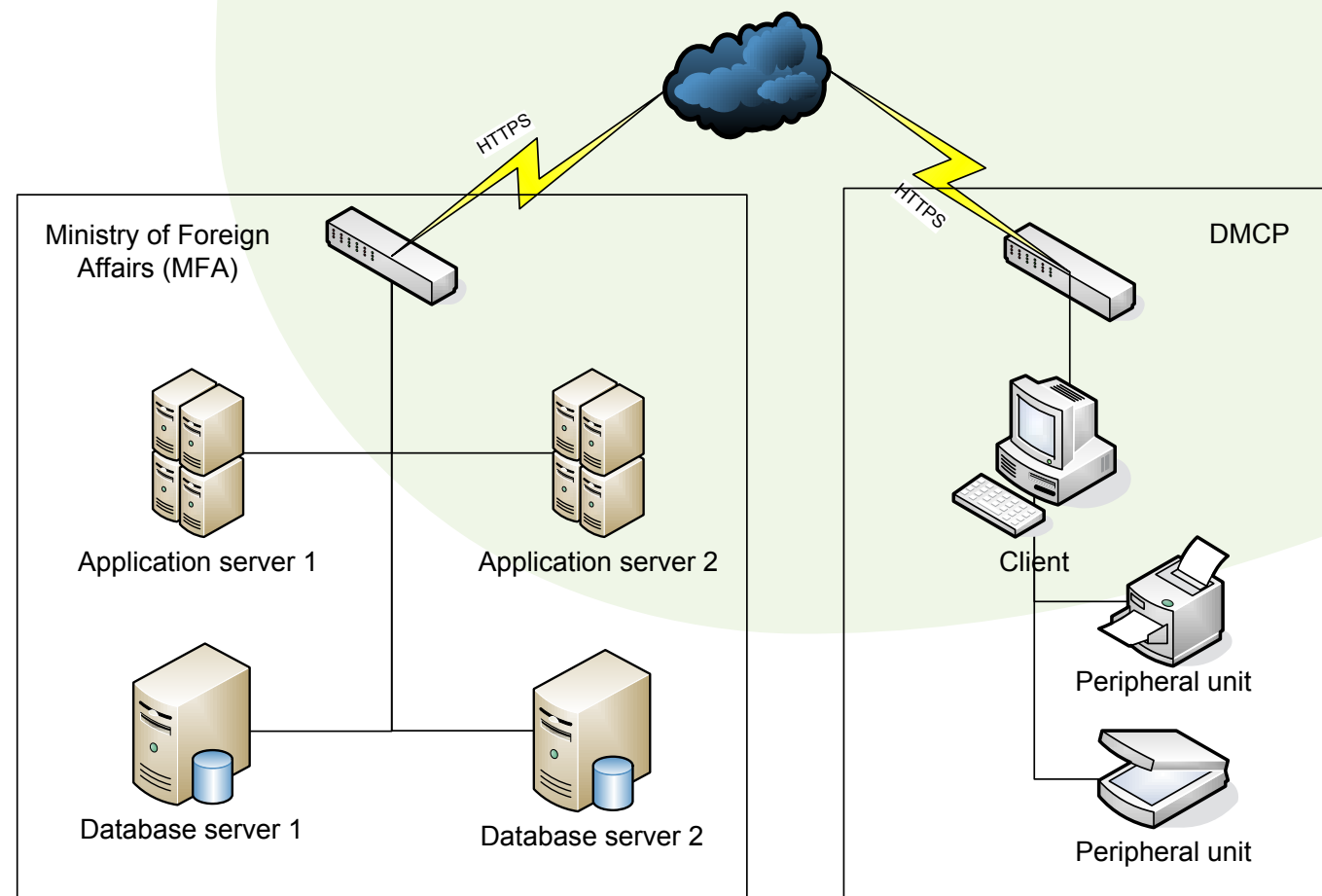
left open and a very open manner and good and constructive approach that has led to achievements not even every EU-MS has

currently was shown there. ...")  
 The VIZIS system is still used in the Slovenian Foreign Ministry and DMCPs, and was updated

Picture 1. Logical scheme



Picture 2. N-VIS system architecture



to accommodate new requirements (Schengen etc.).

In 2005 Tris A joined the SRC Group. This year we transferred our operations to SRC, and Tris A discontinued its operations in 2006. This way all (copy)rights were effectively transferred to SRC and SRC also acquired all contracts involving the VIZIS system.

In 2007 the EAR (European Agency for Reconstruction) published a call for proposals for development of a new national information system to support visa operations in Macedonia (N-VIS). Thanks to our sound references and experience with the subject matter SRC was awarded the contract to develop the new system. Among other specifications, the tender documentation required the contractor to design and develop a new, internet-based system with Oracle Application and Database servers.

The project began in September 2007 with the inception phase: designing the new

architecture, defining user requirements, designing processes and the functional model. The inception phase was completed in October and the products and definitions were approved at the PSC (Project Steering Committee, which included: MFA representatives (PSC Chair + 2 members), EAR representative (Task Manager), Mol representative and two representatives of the N-VIS team).

During this time we performed a selection for the HR in Skopje; in addition to the two Key Experts already defined in the tender bid, the tender required transparent staffing (via a call for submissions published in the local media) for the local team: an administrator, 6 programmers (Senior Java Programmer, Junior Java Programmer, Senior and Junior Database Programmer, Senior Web Designer and Junior Tester/Trainer).

The next phase was the design of the system and initial development. This phase was

completed with the presentation of the system at the Project Inauguration Event (February 2008). The event was organized at the time of EU Commissioner Frattini's visit to Skopje. We presented the system's operation and made a practical demonstration of the work in combination with DMCP Thessaloniki (practical demonstration via videoconferencing). In this phase we discovered a discrepancy between the actual status from that anticipated from the call for proposals: the call for proposals envisioned a connection with the information system of the Macedonian Ministry of the Interior, however it turned out that the system did not support such connectivity. We therefore envisioned a module to integrate the Ministry of the Interior into the N-VIS framework (phonetic search of the police index of persons, request for additional checks of the applicants, viewing the status of the check and entry of the results of additional checks into the system). As a result of the extremely well-received presentation and the massive media response

there was big pressure on the project's executive management to implement a pilot version of the system as soon as possible. In the initial project plan we did not anticipate any pilot implementation, however it was my assessment that the benefits of this change (additional testing and building customer relations) would greatly outnumber the damage which would potentially be caused by proceeding with the initial project plan. We therefore agreed to implement the pilot project on the first 3 DMCPs in April, then continue by adding 3-4 DMCPs per month until project completion.

Because the Ministry of the Foreign Affairs was unable to install the equipment and carry out the introductory training in April, implementation of the pilot project didn't begin until May, and by the end of May the first 3 DMCPs (Thessaloniki, Sofia, Istanbul) were already added to the system, and the remaining 9 would be added by project completion (28.8.2008 according to plan).

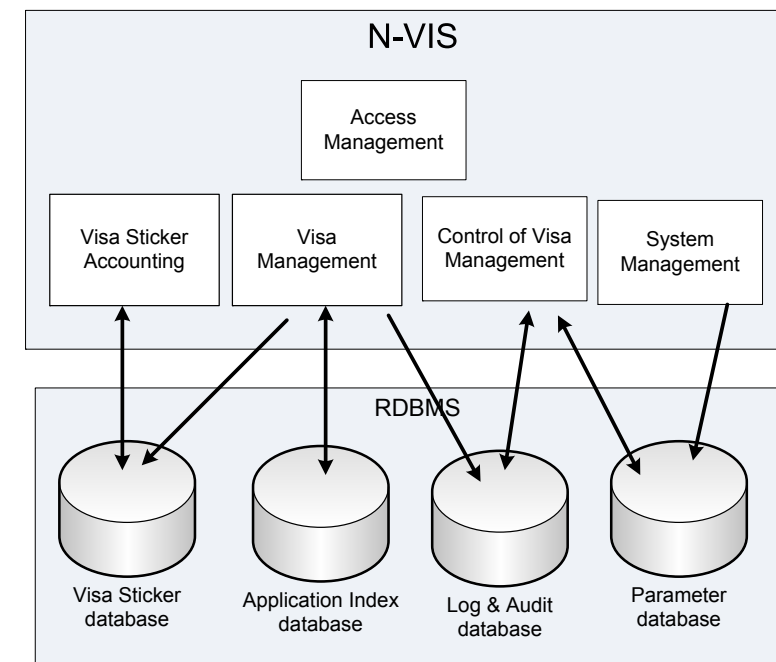
This change of the project proved extremely beneficial as we were able to rally the necessary additional help for live system testing due to the user's positive approach to troubleshooting. We also benefitted from the user's participation in defining the necessary minor system adjustments to better reflect actual needs. On the other hand, thanks to the good

organization between development/testing/pilot activities, the problems encountered during development had no significant impact on finishing development.

Another valuable source of information about the product's quality was the "train the trainers" seminar presented for a group of 16 system instructors (we also involved the executive staff of the Ministry of the Interior and the Foreign Ministry), which took place in Ohrid in July (3 groups of 5 trainers, 5 days per group). The project was completed on time (28.8.2008) after the acceptance tests were carried out (these acceptance tests comprised of 150 criteria, all of which were satisfied) and the documentation and code was delivered to the user (Ministry of the Exterior).

Marko Kraigher

Picture 3. N-VIS system architecture diagram



Testimony of the Ministry of the Exterior:  
**Mr. Refet Hajdari, State Counselor for Consular Affairs :**  
 »This project presented a great challenge for us all, because creating a national system for managing visa operations is one of the steps on the way to faster EU integration efforts, and it is also a precondition for the liberalization of the visa policy with the EU.  
 At the fifth meeting of the Stabilization and Association Council between the former Yugoslav Republic of Macedonia and the EU, the European Commission made the following observations:  
 • Macedonia is cooperating diligently and proactively in the field of the visa policy, where the visa center and the N-VIS serve as a central point, showing good results and achievements and is moving towards meeting all the criteria envisioned in the European Commission's guidelines.  
 • These achievements of the RM, particularly over the last year, provide a good basis for comprehensive liberalization of the visa regime within the RM in the following years.  
 In satisfying these criteria, the N-VIS certainly plays a central role, in addition to meeting other criteria, such as the IGU (Integrated Border Management), new visa stickers, biometric documents etc."