

# Curriculum Vitae

#### Alexander O. Stanev

### **Positions**

- **2012 -** CEO and partner, Synapse Ideas Ltd. Sofia (<a href="http://www.syndeas.com">http://www.syndeas.com</a>)
- **2008 2012** Dep. Director Development and Software Solutions, Information Services Plc. Sofia (<a href="http://www.is-bg.net">http://www.is-bg.net</a>)
- **2005 2008** Head of Oracle Technologies department, Information Services Plc. Sofia (<a href="http://www.is-bg.net">http://www.is-bg.net</a>)
- **2002 2005** Projects Manager, Financial and Tax Systems department, Information Services Plc. Sofia (<a href="http://www.is-bg.net">http://www.is-bg.net</a>)
- **2001 2002** Software Developer , Financial and Tax Systems department, Information Services Plc. Sofia (<a href="http://www.is-bg.net">http://www.is-bg.net</a>)
- 1997 2001 Software Developer, ETA Office Sliven (http://www.etabg.com)
- 1997 1997 System Administrator, Open Society Foundation Internet centre Sliven (<a href="http://www.sliven.osf.acad.bq">http://www.sliven.osf.acad.bq</a>)

### **Projects**

### Project Unified Management Information System for EU funds in Bulgaria (UMIS)

Client Republic of Bulgaria - Council of Ministers (CoM)

Position Project manager

Technologies Microsoft .NET Framework, web applications, PKI, Digital signatures

Description The system implements the full business processes for management and administration of EU funds in Bulgaria. It consists of core system and public modules for general information and e-services. The system implements interfaces with various EU and national systems.

The system is in production since 2008 up to now.

### Project VAT over the Internet eService (InetVAT)

Client National Revenue Agency (NRA) / General Tax Directorate (GTD)

Position Lead developer / Project manager

Technologies HTML, PL/SQL, Oracle cluster 8i/10gR2/11gR2, Java, XML, XSLT,CA Clipper, Delphi, ActiveX, COM, PKI, Digital signatures

Description The system processes value-added tax (VAT) documents and journals, representing all the invoices related to accounts payable and accounts receivable by Bulgarian companies.

The system consists of two types of interfaces: B2G type, used by the clients to transfer the data to Revenue agency and G2G type used by the Revenue agency's employees placed in the front offices.

The system sustains high load and performs with high volumes of data transactions. Both ways communication are highly secured and all data is legally signed by Qualified digital signature.

The system is in production since 2003 up to now.

### Project Tax Declarations over the Internet eService (InetDEC)

Client National Revenue Agency (NRA) / General Tax Directorate (GTD)

Position Project manager

Technologies HTML, PL/SQL, Oracle cluster 9i/10gR2/11gR2, XMLDB, Java, XML, XSLT, XSLT:FO, COM, PKI, Digital signatures

Description The system implements electronic tax forms for personal income and corporate tax.

All calculations and validations are automated. The system implements more than 400 logical check ups on more than 2000 input fields.

All the tax forms are legally signed by Qualified digital signature, under the provision that single tax form can be signed by more than one e-signature owner at the same time - multiple signing.

Filled in tax forms are stored in open PDF format.

The system is in production since 2005 up to now.

### **Project System for e-order placement of Government Securities**

Client Bulgarian National Bank (BNB)

Position Project manager

Technologies HTML, PL/SQL, Oracle 8i, COM, VPN, PKI, Digital signatures

Description The system services the communication between Primary dealers of Government Securities, the Ministry of Finance and the Bulgarian National Bank during Government Securities auctions when orders are placed for acquiring Government Securities. From security point of view it is essential that all data sent by the auction participants are strictly confidential. The system is designed to eliminate any risk of unauthorized access or identity theft. In order to achieve this all interfaces are secured by Qualified digital signature and all data are stored only in signed format to prevent post processing fraudulent modifications.

The system is in production since 2004 up to now.

### **Project Electronic Bank Payments**

Client National Revenue Agency (NRA) / General Tax Directorate (GTD)

Position Lead developer / Project manager

Technologies HTML, PL/SQL, Oracle cluster 8i/10gR2/11gR2, CA Clipper, Delphi, ActiveX, COM, PKI, Digital signatures

Description The system collects movements and states of the Revenue agency's bank accounts. The system acts as part of the national payment system and receives operative information from the banks. Received data is thoroughly checked and later sent to the Regional Revenue Offices, where is uploaded onto their local systems through custom implemented interfaces. The communication is secured by the use of Qualified digital signature in all transactions.

The system is in production since 2003 up to now.

### Project Election information systems

Client Republic of Bulgaria - Council of Ministers (CoM) / Central Election Commission (CEC)

Position Project manager / Manager Technical Activities at Central Operations Bureau Technologies HTML, PL/SQL, Oracle 9i/10gR2, OLAP Data warehouse, PKI, Digital signatures

Description The activities include development of a set of different in purpose information system, managing activities in the following government elections:

- · Presidential elections 2011
- Local elections 2011
- European parliament elections 2009
- Parliamentary elections 2009
- Local elections 2007
- European parliament elections 2007
- Presidential elections 2006
- Parliamentary elections 2005
- Local elections 2003

The systems collects data from the local sections protocols, representing the votes from the elections. On a next level it organizes reentering of the same data by different operators manually for the purposes of data verification. The mathematical module calculates the election results via the D'Hondt or Hare-Niemayer method. On top of the relational database is implemented OLAP cube database, which gives opportunity for fast generation of free form reports for the authorities. An additional subsystem for match analysis is built in for the needs of the Central Election Commission during any decision making process for debatable and unclear issues on the election results. The system automatically generates the hard copy bulletin of the elections. All system interfaces are accessible only by the means of Qualified digital signature.

### **Project SCIS-IFS**

Client State Commission on Information Security (SCIS)

Position Project manager

Technologies HTML, PL/SQL, Oracle 9i, OLAP, PKI, Digital signatures

Description The system manages data business processes within the SCIS, and more specifically at Information Funds and Systems directorate. Its main scope is to develop and support information registers defined by the Classified Information Protection Act (CIPA). The system builds up the core for the SCIS's integrated information system which, manages all classified activities within the Commission. On top of the relational database is implemented OLAP cube database, allowing the production of diverse reports. The system is in production since 2003 up to now.

### **Project PKI TimeStamping eService**

Client Stamplt / Information Services Plc.

Position Envisioning designer

Technologies HTML, PHP, COM / Java, Java applets, MySQL, PKI, Digital signatures

Description A strategic and technological research on implementation of TimeStamp eService was conducted for developing a nation wide governmentally certified PKI authority StampIt brand. The system implements automatic electronic signature on document hash and timestamp from certified time server, implementing RFC 3161. It keeps public registry of issued signatures where the client can check the certified time of signing of given document.

### **Project Digital Signature Tool (DSTool)**

Client Stamplt / Information Services Plc.

Position Project manager

Technologies Delphi, COM, CryptoAPI, PKI, Digital signatures

Description Standalone application for electronic document signing and encrypting. A unique feature on the market is the possibility for multiple e-signing by several parties. It is compatible with all digital certificates recognized under Windows platform. The application is distributed under freeware license and is part of Stamplt product package.

## Project Discrepancy analyses on government Trade registry "DELFI" and The national tax register (NTR)

Client Information Services Plc. / General Tax Directorate (GTD) / Ministry of Justice (MoJ)

Position Project manager / Analyst

Technologies HTML, PL/SQL, Oracle 10g

Description Conducts analysis and finds out discrepancies between the two major national registers. The analysis researches also the possibilities for error elimination and optimization of data structures. A detailed report was prepared and followed up.

### Project Security audit of information assets of bulgarian tax administration

Client General Tax Directorate (GTD)

Position System Auditor

Technologies x86 Assembler, Perl, win32 internals, Linux internals

Description Conducts a thorough security audit of the systems deployed in the General Tax Directorate, the predecessor of National Revenue Agency. Audited systems were running Windows, AIX and Linux base OS-es and used Oracle, MySQL and InterBase DBMS. For the purposes of the audit automated and manual penetration methods and techniques were used. The audit results are summarized in a report, which main goal was to update and strengthen the security at GTD infrastructure.

### **Project Horse Medic**

Client ETA Office

Position Lead developer

Technologies Delphi

Description Standalone application used for detecting malicious/harmful code e.g. trojan

horses, network worms, etc. It was not strictly designed to search for specific kinds of intrusions, but performed a heuristic analyses on the operation system parameters and files. The software sends information alerts when such code is detected to emergency center, where InfoSec experts take over

the incident.

### **Project FaceT**

Client ETA Office / Technical University - Sofia

Position Software Developer

Technologies Delphi, Low level hardware access

Description Software for managing of custom Programmable logic controller (PLC),

developed by engineers at ETA office. The controller itself is used in fine cut

and burnish of glass devices, used in optics industry.

### **Project BacArc**

Client ETA Office

Position Software Developer

Technologies C, MS-DOS

Description Set of software utilities used for managing system back up, implemented

within the Regional Tax Directorate - Sliven, Emergency Medical Help Units

(ER), etc.

#### Education

**1999 -** Technical University - Sofia; Computer Systems and Management

**1995 - 1999** Technical High School of Electrical Engineering and Electronics "Marie

Sklodovska-Curie" - Sliven; Electronic and Computer Engineering

### **Certifications**

**Oracle** Oracle Certified Associate certification, OCA (2004)

Oracle Database Performance Tuning course (2002)

Oracle Database Administration Fundamentals II course (2002) Oracle Database Administration Fundamentals I course (2002)

Program with PL/SQL course (2001) Introduction to SQL course (2001)

VMware Sales Professional/VSP 4 (2011)

VMware Technical Sales Professional/VTSP 4 (2011)

**IBM** Content Manager On-Demand course (2005)

WebSphere Application Developer course (2005)

WebSphere Application Server Administration course (2004)

Microsoft Microsoft Solutions Framework Essentials course, MSF (2003)

Designing and Implementing solutions with Microsoft BizTalk Server 2000

course (2002)

**Moody** Lead Information Security Management System Auditor ISO/BS 7799-

2:2002, IRCA registered course and Moody certification (2004)

Lead Quality Management System Auditor ISO 9001:2000, IRCA registered

course and Moody certification (2004)

**ESI centre** Introduction to Capability Maturity Model Integration, CMMI (2004)

MISti Power IT auditing (2004)

ISACA Certified Information Security Auditor course, CISA (2006)

TechMetrics / SEI Capability Maturity Model Integration (CMMI) (2010)

**BrainBench** Project management (2006)

Oracle PL/SQL (2005)
Network security (2004)
Linux administration (2004)
RDBMS concepts (2004)
High IT Aptitude (1999)

Internet Security Specialist (1999)

Windows NT Workstation Administrator (1999)

Windows 98 Administrator (1999) Windows 95 Administrator (1999) Master Windows 95 Power User (1999)

Computer Technician (1999)

**SBC/EBCL** Financial Management for IT (2010)

**TenStep** Project Management: Preparation for Success (2010)

### Teaching activities and lectures

Distributed WPA PSK security audit, OpenFest 2011 (<a href="http://www.openfest.org">http://www.openfest.org</a>)

- Reverse engineering of blackbox devices running Linux, OpenFest 2010 (<a href="http://www.openfest.org">http://www.openfest.org</a>)
- Our experience with with opensource projects (Wine&Samba), OpenFest 2009 (<a href="http://www.openfest.org">http://www.openfest.org</a>)
- Oracle & Java enterprise solutions (2007-2008), master's course at New bulgarian university (NBU) (<a href="http://www.nbu.bq">http://www.nbu.bq</a>)
- Linux on wireless routers (2006), OpenFest (http://www.openfest.org)
- Single Sign-On (SSO) for opensource projects (2006), WebTech Conference (http://wtconferences.com)
- Information security audit (2006), master's course at University of Sofia "St. Kliment Ohridski" - Faculty of Mathematics and Informatics (FMI) and information Security Association (ISECA) (<a href="http://training.iseca.org">http://training.iseca.org</a>)
- Database Rootkits (2005), OpenFest (<a href="http://www.openfest.org">http://www.openfest.org</a>
- eVoteBulgaria pilot project for e-voting (2005), OpenFest (http://www.openfest.org)
- Vivisection of e- service (2005), WebTech Conference (http://wtconferences.com)
- Secure e-services and transactions (2005)
- Electronic signing of files: Technology and practical solutions (2004), Government Administration's Staff Training
- Online services and digital signatures (2004), Top Bulgarian tax payers training

Presentation slides can be downloaded at <a href="http://alex.stanev.org/presentations">http://alex.stanev.org/presentations</a>
Training slides, not covered by NDA can be downloaded at <a href="http://alex.stanev.org/training">http://alex.stanev.org/training</a>

### Awards

Multiple regional winner of Informatics Olympiad. Graduates high school with honours (gold medal) due to his contribution in the field of Information Technologies development.

### Knowledge and skills

**Languages** Fluent English language

Russian language technical level

**Skills** Team leading

Projects management
Very good analytical skills
Very good lecture skills
Excellent communicativity

Others Driving license, B category (1999)

DoB: 5th January 1981, Sliven

### Professional organizations membership

**ISECA** Association for Information Security

**BGOUG** Bulgarian oracle user group

IIBA International Institute of Business Analysis

### **Contacts**

blog <a href="http://alex.stanev.org/blog">http://alex.stanev.org/blog</a> (in bulgarian)

icq 9371504

**mobile** +359.888.514.544 **city** Sofia, Bulgaria



Last revision: April 2012