#### Financing and economics management

### Information systems in the financing system and economic management ACR











#### **Educational goal**

The aim of this theme is to describe IT and particular IS. We will focus on general knowledge of IT useful in economic management. We meet with IS, both in the general concept and focusing on the Ministry of Defence of the Czech Republic. We mention basic IS Ministry of Defence of the Czech Republic, for example. ISL, ISSP and detail will be devoted to the FIS and IISSP as part of the economic management of the ACR.











#### Content

- 1. Information technology (IT) and information system (IS)
- 2. Structure of the information system
- 3. Information and management system
- 4. Information Systems MoD
- 5. Financial Information System (FIS)
- 6. Subsystem Economy
- 7. Budget Agenda
- 8. Integrated Information System of State Treasury (IISST)











#### References

#### **Basic:**

- MO ČR Sekce ekonomická. Portál FIS/ISSP: Příručka uživatele. v1.0, 2009. 7 s.
- RMO č. 72/2012, Finanční řízení a finanční zabezpečení. Věstník Ministerstva obrany, 2012. Praha: Ministerstvo obrany, 2012. 37 s. Čj. 306-17/2012-SE MO.
- GORDIC [online]. [cit. 2011-03-28]. GORDIC GINIS® PCN. Dostupné z WWW:
   <a href="http://www.gordic.cz/portal/Produkty/GORDICsupsupGINISsupsup/Spr%C3%A1vn%C3%ADagendy/PCNPI%C3%A1nov%C3%A1n%C3%ADslu%C5%BEebn%C3%ADchcestan%C3%A1v%C5%A1t%C4%9Bv/tabid/207/language/cs-CZ/Default.aspx>.
- O Státní pokladně. [online]. [cit. 2014-08-26]. Ministerstvo finanční ČR. *O Státní pokladně*. Dostupné z WWW: <a href="http://www.statnipokladna.cz/cs/o-statni-pokladne">http://www.statnipokladna.cz/cs/o-statni-pokladne</a>.
- BUŘITA, L. a kol.: Učebnice Informačních systémy. Brno: Univerzita Obrany, 2005. 140
  s.
- TVRDÍKOVÁ, M. Aplikace moderních informačních technologií v řízení firmy. Praha: Grada Publishing, a.s., 2008. 176 s. ISBN 978-80-247-2728-8.
- TVRDÍKOVÁ, M.: Zavádění a inovace informačních systémů ve firmách. Grada Publishing, Praha 2000. 110 s. ISBN 978-80-7169-703-6.











#### References

#### **Recommended:**

- GORDIC [online]. [cit. 2011-03-26]. GORDIC GINIS® Ekonomika. Dostupné z WWW: < http://www.gordic.cz/portal/Default.aspx?tabid=142>.
- GORDIC [online]. [cit. 2011-03-28]. GORDIC GINIS® Agenda Rozpočet. Dostupné z WWW: < http://www.gordic.cz/portal/Default.aspx?tabid=146>.
- GORDIC [online]. [cit. 2011-03-28]. GORDIC GINIS® PCN. Dostupné z WWW: <a href="http://www.gordic.cz/portal/Produkty/GORDICsupsupGINISsupsup/Spr%C3%A1vn%C3%ADagendy/PCNPI%C3%A1nov%C3%A1n%C3%ADslu%C5%BEebn%C3%ADchcestan%C3%A1v%C5%A1t%C4%9Bv/tabid/207/language/cs-CZ/Default.aspx>.
- Ministerstvo financí ČR [online]. c2005 [cit. 2011-03-29]. Manuály. Dostupné z WWW:
   <a href="http://www.mfcr.cz/cps/rde/xchg/mfcr/xsl/vyhlasky\_44707.html?year=2009">http://www.mfcr.cz/cps/rde/xchg/mfcr/xsl/vyhlasky\_44707.html?year=2009</a>>.
- NEČAS, Kamil. Rozpočtování u nákladového střediska AČR s využitím informačních technologií. Bakalářská práce. Brno: Univerzita obrany, 2011. Vedoucí práce pplk. Ing. Petr Musil.











## 1. Information technology (IT) and information system (IS)











## Information technology (IT) and information system (IS)

- Information technology (IT) and information systems (IS) are two terms that we encounter almost every step, but it is difficult to precisely define, since there is a large range of possible definition.
- IT in the narrower sense form a technical base IS, it is the technical resources (hardware) and software (software).
- "Information technology indicates the progress status of processing of information for their wide use in practice, thus everything that participates in any way in the analysis, design, development, implementation and operation of information processing systems."











## Information technology (IT) and information system (IS)

- "The information system can be defined as a set of people, methods and technical resources to ensure the collection, transfer, storage, processing and presenting data with the aim of creating and providing information according to the information needs of the recipients employed in management systems."
- "The information system is generally supportive system for the control system. If we want to project management system as such, we need to know what are the goals and information system to solve, so that these objectives supported."











## 2. Structure of the information system











### Structure of the information system

- Technical resources (Hardware HW)
- Software tools (Software SW)
- Organizational resources (ORGWARE)
- The human component (Peopleware)
- Data base (Dataware)











### Structure of the information system

- Technical resources (Hardware HW) consisting primarily of computer systems of various types and sizes, with respective peripheral units, which, if necessary, connected through a computer network.
- Software tools (Software SW) include the system programs that control the operation of the computer, ensure efficient data communication and computer system with the real world. There are also application programs aimed at tackling certain classes of problems specific groups of users.











### Structure of the information system

- Organizational resources (ORGWARE) include a set of regulations, rules and recommendations, defining the operation and use of IS and IT.
- The human component (Peopleware) they are adapting well as the efficient functioning of a person in a computer environment in which it is located.
- **Data base (Dataware)** is a set of data files stored on storage media accessible to authorized users.





















- Transaction Processing Systems (TPS)
- Decision Support Systems (DSS)
- Executive Information Systems (EIS)

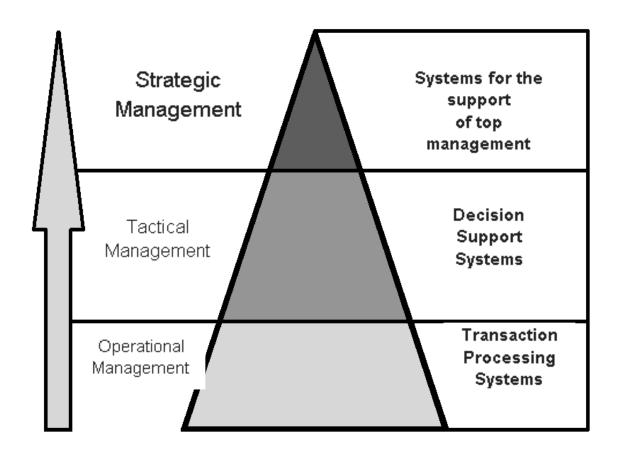






















#### **Transaction Processing Systems (TPS)**

- TPS are the successors of the classic batch systems for the automation of corporate agendas, such as calculations payroll, billing, accounting, inventory, records of persons, material accountancy etc.
- Is primarily used for operational management level and are operating IS. Mainly provide basic processes in the organization. Their mission is to collect basic data of the company or institution











#### **Decision Support Systems (DSS)**

- DSS are designed to perform a variety of data analysis without the need for complicated control. Its users are mainly middle management component of the organization.
- The basis is a computer aided decision analysis methods and operating system analysis.
- These systems also provide management and certain comfort in the sense that he allow almost immediately perform the calculations and manipulation of input data.
- Also provide the possibility of a graphical display of results, their presentation and also documentation form that has control of far greater explanatory value.











#### **Executive Information Systems (EIS)**

- EIS is located on top of the control pyramid.
- They are primarily intended for senior management of the organization, which is more interested in information with neighbourhood organizations (technical innovation, market, bank, political situation, etc.).
- They are technically designed so as to enable access to external data and were also connected to the IS business.
- From the basic data of operational nature generate data with high predictive value.











### 4. Information Systems MoD











### **Information Systems MoD**

- Currently the information structure of the MoD made up of many separate information systems that have their own software, security policy and data base. But a certain individual IS integration.
- This integration is very complicated, as the systems were created independently and mostly consisted of different software companies, so there is multiplatform environment mutually not entirely compatible service.
- Therefore you cannot present all IS used in the resort MoD, therefore mention only the most important information systems that are in some way linked to the Financial Information System (FIS), which belongs to the economic IS and its agenda Budget is used for budgeting.











### **Information Systems MoD**

#### **Economic IS the Ministry of Defence:**

- Financial Information System (FIS)
- Information System for Logistics (ISL)
- Information System and service personnel (ISSP)
- Information system of program funding (ISPROFIN)
- Central registration of subsidies budget (CEDR)
- Electronic commerce support (SEPO)





















- **Intranet FIS** was founded in 1998, its purpose is to provide information support for the management and implementation of the financial security of the MoD.
- FIS is among the economic IS, which include more
  - Information System program financing (ISPROFIN)
  - Central Registry of subsidies register (CEDR).











#### The basis Intranet FIS applications were

(in brackets are Czech abbreviations):

- Accounting and Budget (UCR 98),
- The draft budget (SNR 99),
- Salaries and wages (PAM),
- Evidence of damage (ŠKO),
- Evidence of payables and receivables (ECL),
- Evidence of procurement (EVZ),
- Reports and Report (VYK).











- Intranet FIS became obsolete and was replaced by the Portal FIS / ISSP, this is a new professional communication between users FIS respectively ISSP.
- The new portal brought a change in the concept of working with the information stored in the portal. It is divided into information for all users (http://www.fis.acr) and personalized section (http://portal.fis.acr).
- The basis of both parts is full text search information like, for example Google website. Personalized part is only accessible when the user logs under the account that accesses applications FIS / ISSP.
- This feature allows the user to create a portal solution within its own pages with their own information.











Portal FIS / ISSP are part of the IS GINIS from GORDIC.

This is a comprehensive solution IS organization.

- It includes economic agenda, management of document circulation through filing service, a number of registers and administrative duties including software solutions to administrative proceedings.
- The **company GORDIC** trying this IS evolve in line with the legislative environment of public administration and also with regard to the high level of security and authenticity. At the same time, this IS has a number of specific modules to support the activities of state and local government authorities. It also includes applications for e-government, including modern portal components.











#### **Basic components IS GINIS:**

- The core of the system GINIS,
- Subsystem Economy,
- Subsystem Record Service,
- Human Resources Management Subsystem,
- Subsystem Registry,
- Administrative Subsystem agenda.











### 6. Subsystem Economy











### **Subsystem Economy**

- We will only deal subsystem Economy; this subsystem will explain the components agendas budget, since it is precisely this subsystem with an agenda.
- The budget is the basis for the budgeting process. Individual agendas or functional areas of economic processes in the system are recorded in specialized modules (components).
- These modules allow comfortable, conclusive, transparent and powerful double-entry bookkeeping and budgeting, including the management of related operational records.
- All operations that realize the economic nature of the documents, the system carried over agenda's books and goal to be recorded in the diaries and journals entries budget.











### 7. Budget Agenda











### **Budget Agenda**

- Agenda of the budget is comprised of a set of application components that are used to collect requests for budget while integrating them into different investment and noninvestment activities.
- Administrators can use the budget to balance the needs of the breakdown of the approved budget.
- The vast majority of the processing operations budget and accounting processing has a direct link with the system sustained medium-term budget outlook.











#### **Budget Agenda**

#### Key components of the agenda Budget modules are:

(in brackets are Czech abbreviations)

- Balancing the budget (BAR),
- Classifications and acquisition budget calculations (CKR, PKR),
- Medium-term budget outlook (SRV),
- Acquisition of budget documents (ROZ).





















According to the Government Resolution no. 1217 imposes a leading administrators chapters of the state budget of the CR to **provide prompt MF cooperation of professionals** for the area:

- Budget preparation,
- Implementation of the budget,
- Payments,
- Accounting
- IT applications
- IT Infrastructure (communication with IISSP).











- The basic objective of the State Treasury is to ensure:
  - quality,
  - timely and
  - consistent information
  - necessary for:
  - proper and
  - objective management of state finances.
- This resolution Government commissioned the Ministry of Defence of the Czech Republic to the IS for economic management was also connected to the Treasury.











The aim of the Ministry of Finance platform project is to implement IISST, which would allow:

- Effectively manage state finances and achieve transparency in the expenditure of state funds,
- Implement the objectives of fiscal policy of the state,
- State liquidity to operate at minimum cost / highest yields
- Ensure the payment of public administration, including the "single state account"
- Support the management of state assets and liabilities,
- Effectively prepare the state budget,
- Transparently implement the state budget,
- Ensure accurate financial reporting,
- Introduce expenditure control ex-ante and ex-post.











Project objectives will be achieved if IISSP provide the following functions of the State Treasury:

#### **Key comprising:**

- Centralization of revenue,
- Expense management,
- Support for asset management,
- Cash management,
- Support for debt management.

#### **Support comprising:**

- Budgetary planning,
- Financial planning
- Payments,
- Accounting
- Financial control,
- Reporting.











#### Main objectives set for the project:

- Objective Conclusive and verifiable results of operations, assets and liabilities of the state,
- Objective Transparent flows of public finance,
- Objective Central management of all state funds,
- Objective Managing the availability of SR,
- Objective Integration of management control,
- Objective Process and data integration,
- Objective Linking physical and financial management,
- Objective introducing a central system of state accounting information.











To fulfil the objectives of the State Treasury are used, these subsystem:

(in brackets are Czech abbreviations)

- The central accounting system state (CSÚIS)
- Budget preparation (RISPR),
- Implementation of the budget (RISRE)











### Questions?

# Thank you for your attention









