



Determinants of ITSM Adoptions: Insights from INNOTRAIN IT Project

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Agenda



- Research approach
- Key concepts of ITSM
- Barriers to ITSM adoption
- Critical success factors (CSFs) for ITSM adoption
- Discovering the most critical determinants
- Insights from INNOTRAIN IT project
- Limitations and further research

Research approach



- Research goal
 - investigation of determinants of IT service management (ITSM) adoption
- Determinants
 - factors having influence on the project success
 - positively contribute to the project success (**critical success factors - CSFs**)
 - have a negative influence and impede the positive run of the project (**barriers**)
 - => CSFs + barriers

Key concepts of ITSM concept

| Traditional IT | ITSM |
|----------------------------|-----------------------------|
| Technology focus | Process focus |
| "Fire-fighting" | Preventative |
| Reactive | Proactive |
| Users | Customers |
| Centralized, done in-house | Distributed, sourced |
| Isolated, silos | Integrated, enterprise-wide |
| "One off", adhoc | Repeatable, accountable |
| Informal processes | Formal best practices |
| IT internal perspective | Business perspective |
| Operational specific | Service orientation |

- ITSM definition
 - strategy by which information systems are offered under contract to customers and performance is managed as a service
 - the area that focuses on defining, managing, and delivering IT services to support business goals and customer needs
- ITSM is broad
 - encompassing IT planning, delivery, support, and security
- ITSM vs. traditional IT
 - focus on business and clients needs
 - use of good practices to standardize IT
 - process-focused
 - facilitates interactions between technical IT personnel and business customers and users

Barriers to ITSM adoption

- survey among 201 American companies (Winniford et al. 2009)
- barriers preventing companies from using ITSM
 - **Lack of information** – companies need more information about ITSM approach,
 - **Satisfaction with current IT** – companies claimed that they were generally satisfied with their current levels of IT service delivery,
 - **Lack of pressure for ITSM** – no one was asking companies to initiate service management activities,
 - **Costs too much** – companies claimed that it was too expensive to move to service management,
 - **Insufficient monitoring and management capabilities,**
 - **Lack of development of ITSM** – companies claimed that ITSM was still in the research state,
 - **Lack of support from other business groups** – company representatives claimed that they were not able to convince other business groups to move towards service management,
 - **Lack of product maturity** – companies claimed that available ITSM products were not mature enough.

Barriers to ITSM adoption

- four case studies among successful ITSM adopters, USA and Australia (Pollard and Cater-Steel 2009)
- challenges for ITSM implementations
 - **Dual roles** – difficulties in conforming to the new ITSM processes in everyday work; ITSM framework gives clarity to roles and responsibilities of staff members.
 - **Engaging the right people** – problems reaching the right people and involve them in the ITSM adoption project; connected with the general challenge in making the needed changes to the corporate culture.
 - **Gaining support from the technical staff** – problems with the technical staff and their resistance to adhering to the new documentation and communication process.
 - **Changing the focus of problem solving** – related to gaining support from the technical staff; changing the focus from “crisis management” and “workarounds” to consideration of the real problems as defined by the ITSM framework and resolving the underlying causes of incidents.
 - **Measuring ROI** – the costs of ITSM adoption can be quantified, BUT it may be very difficult to actually measure real benefits from ITSM implementation.

Barriers to ITSM adoption

- case studies, 3 large service organizations that implemented ITIL (Shang & Lin 2010)
- barriers to ITSM implementations from 4 perspectives: financial, customer, internal process, and learning/growth
 - **Dissatisfied customers** – due to the gap between the degree of improved service quality and customers' perception; customers prefer direct communication with IT engineers over customer service staff.
 - **Inability to satisfy customers' specific needs in time** – connected with preferred direct contact with IT service supporting engineers and expectations to obtain an immediate solution to the problem.
 - **Extra costs in education and management** – ITSM implementation usually requires large investments into trainings courses, seminars, taking certifications, internal process maturity assessments etc.
 - **Time lag between investment in ITIL project and performance outcome** – difficult to increase firm performance in short-run; long term learning about new quality service processes needed; direct outcomes generated from enhanced quality of services are hard to measure.
 - **Conflicts between urgent needs for quality improvement and cost consideration** – improvements on service quality and increased flexibility difficult to measure from a financial perspective; this could lead to the misperception of no return on investment.
 - **Difficulties in implementation** – ITSM simplifies the existing processes, but requires more time in checking and designing new processes.
 - **Employee resistance** – lack of employees' commitment; a common reason for the IT staff's resistance: perceived unfairness of ITSM, employees recording the details of problem solving into a database may lose their advantage.
 - **Lack of interdepartmental collaboration** – primarily to lack of close collaboration between IT service support and customer service departments.

Critical Success Factors for ITSM Adoption

- research in a large Australian government agency (Tan et al. 2009)
- CSFs for ITSM adoption
 - **Senior management support** – understand the magnitude of the implementation and be prepared to allocate sufficient resources; IT governance issue: leadership, organizational structures and processes to ensure that the company's IT sustains and extends the company's strategy.
 - **Project champion** – should be appointed; roles: actively and enthusiastically promote the innovation, build support, overcome resistance and ensure that the innovation is implemented. should understand the underlying technology as well as the business and organizational context.
 - **Relationship with multiple vendors** – different vendors may be engaged at different stages of the project; it is beneficial to maintain an open and honest relationship and to foster trust, cooperation and communication; mutual benefits, commitment and predisposition are important predictors for outsourcing success.
 - **Change in corporate culture** – from a technology focus to a focus on service; must be managed as an integral part of the implementation plan; the hardest type of change to manage; buy-in from project participants essential.
 - **Realization of benefits** – ITSM adoption requires economic justification of benefits; benefits should be carefully managed and several elements from the ITSM process design methodology may be used for this purpose (such as benefit register, benefit deposit slips, benefit saving bank).
 - **Project governance and execution** – many elements include: clear objectives and appropriate accountability, risk management, monitoring and reporting, and staying focused on the project.

Critical Success Factors for ITSM Adoption

- 4 case studies among ITIL adopters, USA and Australia (Pollard and Cater-Steel 2009)
- CSFs for ITSM implementation
 - **Top management support** – link between the ITSM initiative and the company's corporate strategy; support essential to endorse policy and enforce compliance to the standard processes across the entire organization.
 - **Training and staff awareness** – buy-in across all stakeholders in the ITSM initiative needed; appropriate training program and information dissemination about the project; increased awareness beneficial in overcoming resistance from the company's staff.
 - **Interdepartmental communication and collaboration** – connected with training and staff awareness; the participants of the ITSM adoption project should meet on a regular basis to provide support and advice to each other.
 - **ITSM-friendly culture** – connected with the shift of an IT organization's culture and focus from the technology to the business strategy; engage external consultants and place them in senior IT management positions.
 - **Process as a priority** – focus on processes before selecting and implementing ITSM tools needed; processes must be identified and addressed first, then appropriate tools should be selected and implemented to support and integrate processes; processes may include incident management, problem management, change and configuration management.
 - **Customer-focused metrics** – connected with a change from technology-focus to customer-centric metrics; recorded and reported metrics should be meaningful to the customers.
 - **Use of consultants** – external consultants should be engaged as trainers, IT managers, project managers, process owners, and tool implementers; effective knowledge transfer from the consultants to the permanent staff should be ensured; costs should be calculated;.
 - **Timing and careful selection of an ITSM toolset** – the most appropriate for the company's needs; application of an ITSM toolset should be performed in the appropriate time.

Critical Success Factors for ITSM Adoption

- 6 case studies among large German organizations implementing ITSM (Hochstein et al. 2005)
- CSFs for ITSM adoption
 - **Quick wins** – A company may demonstrate the benefits of service-oriented IT management by showing “quick wins”. This might be connected with establishing measurable project goals.
 - **Strive for continuous improvement** – in order to guarantee the sustainability of success.
 - **Marketing campaigns** – A company should use marketing tools and campaigns in order to create acceptance and understanding. These might include buy-in-phase, management of expectations, use of internal publication media, road shows, workshops, and seminars.
 - **Obtaining support of management** – primarily needed in order to be able to exert pressure on company’s employees.
 - **Training** – A company should implement broad-based training and enforce personnel development.
 - **Virtual project teams** – should be formed so that the new processes would not be developed separate from operational activities. In this way the company will simultaneously achieve integration of service orientation into existing areas.

Critical Success Factors for ITSM Adoption

- opinions of 15 experts from Norwegian Armed Forces (Iden and Langeland 2010)
- CSFs for ITSM adoption (ranked in order of decreasing importance)
 - Managers at all levels must have an ownership to the ITSM introduction (**Management ownership**)
 - Senior management must formally decide the introduction of ITSM (**Top management support**)
 - Identify and involve key personnel, and let them participate in the design and improvement of processes (**Team**)
 - Senior management must have knowledge about and understanding of what process orientation means (**Top management awareness**)
 - Start with and prioritize a few ITSM processes where there are greatest opportunities for success (**Process approach**)
 - Information, characterized by openness, must be given up front to personnel and customers about what ITSM means, why ITSM is being introduced and what it will entail (**Information**)
 - General competence in process thinking and ITSM must be provided for all concerned (**Competence**)
 - A modular ITSM system is needed and must be applied for all processes (**Solution**)
 - Plan for and communicate positive project results early and along the way (**Benefits**)
 - A specific training program for the ITSM introduction of the various processes must be provided (**Training**)
 - Implement a standard system for measuring, analyzing, and reporting on service level (**Monitoring**)
 - Be conscious about the fact that introducing ITSM means changing organizational culture (**Culture**)

Discovering the most critical determinants

- expected benefits from the ITSM project
 - realization of benefits should be planned; realization the sooner the better; advisable to achieve positive project results early and communicate to the whole company
 - time lags between investment in ITSM and performance outcomes; difficulties in measuring return of investment in ITSM solution
- top management support for the project
 - throughout the whole project lifecycle; resource allocation and motivating participants for project duties; understanding the concept of ITSM and process orientation
- staff awareness
 - stakeholders across the whole company should be competent and aware of ITSM-related ideas; achieved through the training program and information dissemination about the project
 - lack of information about the ITSM initiative
- project team building / participants choice
 - ITSM adoption performed with the help of the project team; people carefully identified in the company and participating in the design and improvement of processes; build the project team that consists of motivated and involved people
 - problems with engaging the right people

Discovering the most critical determinants

- collaboration
 - significant role of company's IT department; it should closely collaborate with other company's departments with a special emphasis on customer service unit; interdepartmental collaboration should be established or evaluated at the very beginning of the project
 - lack of support from other business groups may become a significant barrier to the project success
- ITSM solution quality
 - it is advised that the actual ITSM product should be mature, have modular structure, and should be applicable for all crucial processes of the company
 - lack of product maturity
- focus on customers / customer satisfaction
 - changing focus of the company operation: the ITSM implementation should be combined with the focus on the company's customers and performance measures should be adjusted accordingly
 - risk of customer dissatisfaction especially during the phase following the actual introduction of the ITSM solution; due to lack of expertise in new processes and approach, combined with different customers' expectations

Insights from INNOTRAIN IT project

- project goal
 - to disseminate ITSM approach among European SMEs by creating a new method tailored for SMEs and train SMEs managers and employees to use this method
- 6 European regions involved in:
 - Austria, Czech Republic, Germany, Hungary, Poland, and Slovakia
- initial step
 - to diagnose the actual situation as regards ITSM awareness and usage by European SMEs
- exploratory survey among the all involved regions
 - 215 survey responses (185 from SMEs)
- research comparison
 - prior research: mainly among large companies in highly developed countries
 - INNOTRAIN IT: mainly SMEs, from both developed and **transition economies** (i.e. economies in transition from communist style central planning to free market systems)

Insights from INNOTRAIN IT project



■ Drivers for ITSM

- Cost transparency
- Cost reduction
- Workload reduction
- Business service quality enhancement
- Business competition

■ Barriers against ITSM

- Missing ITSM awareness
- Complexity of existing frameworks
- Lack of skills
- Work overload and lack of resources

Insights from INNOTRAIN IT project: Comparing the results (large vs. SMEs)

- similar importance regardless of company size
 - cost-related issues; company's staff awareness and skills
 - vital importance to set the cost of ITSM adoption against expected benefits and try to achieve ROI
 - companies of both types may suffer from inadequate skills of their employees and lack of awareness as regards ITSM approach
- more important for large companies
 - top management support for the ITSM project; project team building; project participants choice
 - might be connected with more complex considerations of ITSM adoption in large companies and related higher complexity of managerial issues
- more important for smaller companies
 - problems and barriers connected with complexity of ITSM approach; work overload of company's employees
 - existing ITSM frameworks may be too complicated for SMEs and may not fit their needs and usually restricted resources
 - restricted human resources (caused by the organization's smaller size) may be connected with employees' work overload

Limitations and further research



■ Limitations

- prior research works are based first and foremost on the experience of large companies based in highly developed economies such as Australia or countries from Europe and North America
- transition and emerging economies appear to lag behind developed countries in various ITSM-related areas
 - use of sophisticated IT solutions,
 - awareness of new IT-related methods and concepts,
 - strategic approach to IT,
 - level of IT maturity,
 - attention paid to business strategy and its alignment with IT strategy

■ Further research

- determinants of ITSM adoption among non-developed, transition and emerging economies; different factors might appear
- examination of ITSM adoptions in small and medium sized enterprises; SMEs may experience different considerations mainly due to restricted resources as compared to large organizations.

Thank you!



Questions?
Comments?
Suggestions?

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