

# MAKING THE MOBILE PROCESS SERVICE MARKET, WITH A SMART BUSINESS NETWORK, IN THE NORTHERN DIMENSION

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*Making a new market is a challenge. It requires creation of a new form of value and sustainable capture of a fair market share for the new-market makers. The author's mission is to initiate the creation of the Mobile Process Service (MPS) market in the Northern Dimension (ND) that consists of Canada, Nordic/Baltics and North-West Russia – hence NDMPS. Mission, Segmentation, Differentiation and Positioning are to be pre-specified at the NDMPS Board level – only then will Innovation begin. Customized Mobile Process Service will enable multi-nationals that conduct such as selling and delivering of complex products and field services, to operate in a wirelessly enabled, process-oriented manner bestowing high quality and productivity upon those processes. Meanwhile the Smart Business Network (SBN) member vendors will each move up the value chain thus escaping from an increasingly commodity-provider role in this Enterprise Mobility domain.*

## 1. INTRODUCTION

The proposed new market would represent a leap to a conceptually high level. Today's out-of-the-box, generic software-as-a-service (SaaS) mainly automates traditional processes creating little additional value for users. Vendors of advanced technology and services (such as network services) find their evolving technologies applied as incremental improvements rather than as components of systemic innovation. This paper will focus on several innovations which the reader may (or may not) agree are nascent (not yet perceived) needs of customers and vendors alike – satisfaction of which could result in win-win.

Incremental innovations, transformed to systemic innovations by inductive thinking, are to be rapidly diffused. Some examples of such an approach are to be discussed - each example in a separate chapter (numbered 2 to 10):

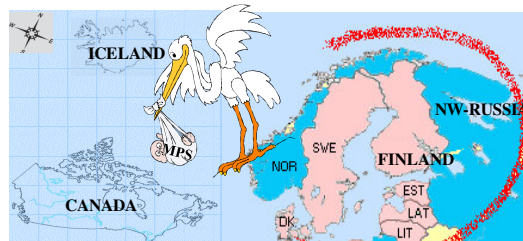
- Chapter-2 Initiative by a Smart Business Network (SBN): collaboration within a SBN organization, even amongst traditional competitors, can be superior to a hierarchical value chain from both user and vendor perspectives.
- Chapter-3 Cascading innovations: collaboration between Vendors to form a Smart Business Network (SBN) creates the MPS; the PFCN vision for dynamically formed teams at the Customer level depends on MPS.
- Chapter-4 Emphasis on process-orientation: each module of a customized MPS is a service that supports an explicit instance of a defined process.

- Chapter-5 Separation of Quality and Productivity: these two aspects are widely confused in definition and practice. Quality and Productivity are usually reciprocally related in S-curve manner.
- Chapter-6 Board guidelines set scene for innovation: goal is to meet functional requirements through simple-to-use solutions. Scientifically derived innovations minimize complication associated with inevitable complexity.
- Chapter-7 Education and research as the means; wealth and welfare of society as the end: The primary end is rapid diffusion of systemic innovation that encompasses processes, organization, software and communication – the two latter are collectively referred to as ICT (information communication technology).
- Chapter-8 Avoiding planning paralysis: Ready-Aim-Fire is to be replaced by Ready-Fire-Aim; aiming can be refined once the ‘missile’ is in flight. Jumpstart and Pilot can simulate and emulate the commercial condition. We aspire to reach commercialization over the short period of fifteen months that began with Engagement (start Jumpstart) in April 2008, planned to be followed by Conception (launch Pilots) in January 2009 and will hopefully end with Birth (Commercialization) in October 2009. Such a cycle has been started, and postponed several times since 1995 when the vision was articulated, and feasibility demonstrated, at LM Ericsson. (14), (16) and (18).
- Chapter-9 Live demonstration: concurrent with presentation of this paper at PRO-VE’2008 in September 2008, links will be provided to narrated, animated Power-points for those not at the live presentation (11). The targets of the links will be updated from time to time - one is already reachable even though the demonstration has yet to be finalized

Geographically the Northern Dimension is proposed to include Canada, Nordic/Baltics (NORBA) and North-West Russia.

A marketing initiative would bring Task Forces to this region to meet Smart Business Networks that would offer to conduct MPS pilot projects in preparation for global deployment.

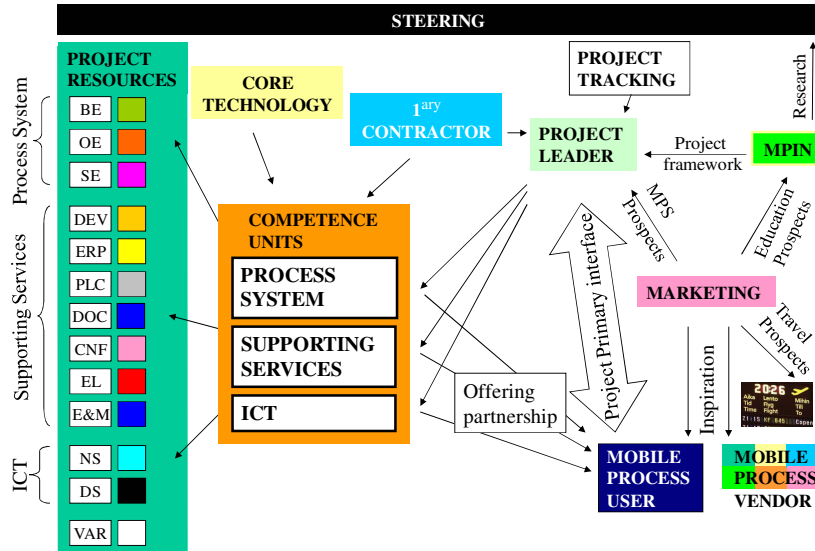
#### BIRTH OF MOBILE PROCESS SERVICE IN THE NORTHERN DIMENSION



Build it (the MPS Competence Region)  
– and they will come  
*Kevin Costner, Field of Dreams*

## 2. INITIATIVE BY A SMART BUSINESS NETWORK

### SMART BUSINESS NETWORK (SBN) ORGANIZATION

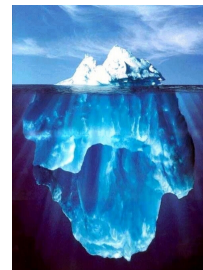


The totally disaggregated SBN organization model has twenty-five objects. PROJECT RESOURCES, COMPETENCE UNITS and MOBILE PROCESS VENDOR can be thought of as cluster objects within which ‘generalization’ can be described.

Project-resources are sub-contractors to Competence-units. Project-resources are recruited by Competence-units. Project-resources exist in four clusters as follows  
Process system cluster: BE=Business engineering, OE=Organization engineering, SE=Software engineering  
Supporting services cluster: DEV=Devices, ERP=Enterprise resource planning, PLC=Product life cycle, CNF=Conferencing, EL=E-learning, E&M=E-mail and messaging  
ICT cluster: NS=Network service, DS=Data service  
Value-added retailer cluster: VAR= Value-added retailer

Without doubt the most important aspect of such an organization is the net-value of the synergy that exists between the role holders in which specialization brings value and cost-to-organize and harmonize off-sets that value.

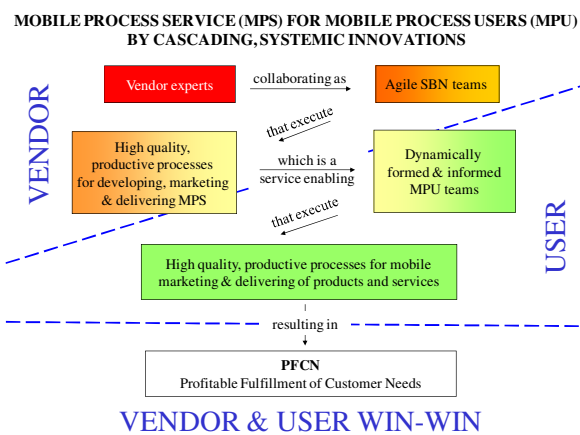
This organization model is the tip of a massive iceberg in which most synergies are ‘under-the water’. Diverse examples of creation- and capture-of-value synergies include that MPIN (Mobile Process Innovation Network) described in Chapter-7 of this paper, provides a common environment for education, research and liaison between customers and vendors concurrent with Industrial Pilot Projects (IPP)



leading to rapid diffusion of education and research to commercialization. Another deeply submerged synergy is that travel costs during marketing, education and research activities are sponsored by airline SBN members – the latter get their pay-off as exclusive carriers during pilot-projects and commercialization.

### 3. CASCADING INNOVATIONS

Achievement of the MPS mission (make the MPS market) can be considered as a cascade of two innovations:



- **VENDOR** - an innovation related to how to organize the vendors in a manner that enables developing, marketing and producing a customized MPS for each Mobile Process User (MPU), and
- **USER** - an innovation related to how the MPU will exploit the MPS to transform its mobile processes.

This has turned out to be a tricky catch-22 in which the **MARKETING** role, assumed by Integrated Marketing, has attempted to convince both sides that there is a potential win-win.

At time of writing this paper there is a shared interest by a cluster of SMEs in Stockholm to invest in a few days to build a demonstration of how a MPS could enable a single mobile process, and there is interest from Toromont Energy in Canada to study such a demonstration seriously if it shall be built. Distinguished Professor Emeritus Don Cowan, University of Waterloo has offered to host and chair a conference at which such a demonstration would be shown and debated. Both Vendors and Users need to see **REALITY** – a live demonstration.



#### 4. EMPHASIS ON PROCESS-ORIENTATION

According to Ivar Jacobsen: "a PROCESS is a series of activities that produces a result of value – for the Customer".

There is still a wide discrepancy between Business PROCESS Orientation as a way of thinking and Business Process Orientation as a way of working (3).

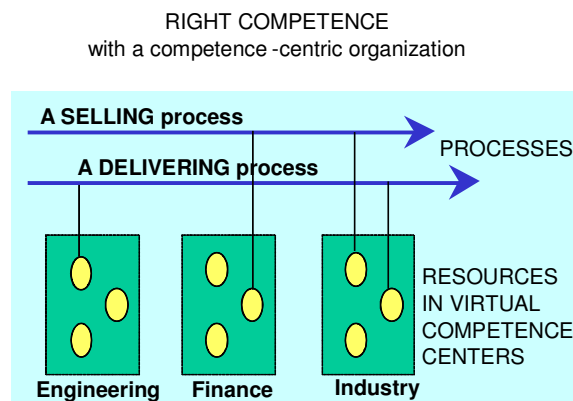
According to the CAT EMEA Service Process manager (8): "for Caterpillar, PROCESSES, based on long experience, a vision of the business future and superior delivery, are sustainable competitive advantages in the field service business. Capture of that knowledge as models, and creation of subsequent systems from such models, is the route in which we are already engaged and we therefore have a conceptual fit with Integrated Marketing."

So what is the difference between a Product (which could be an out-of-the-box software), Software-as-a-Service (SaaS) and Mobile PROCESS Service (MPS)? MPS is the result of thinking outside the box. The Editor of MobileMonday has a journalist's analogy to a bird, an airplane and Superman (19).

It might be that PROCESS orientation really is still more a way of thinking than a way of working (3). If that is so it's not surprising that there is still no market for a Mobile PROCESS Service – hence our mission to 'Make the Mobile PROCESS Market'. It is our increasing perception that a MPS is a pre-requisite for making Business PROCESS Orientation a way of working (rather than just a way of thinking) – thus we have a classical Catch-22 situation (1).

This Catch-22 situation will ultimately be overcome when true MPS becomes successfully commercialized – but we know how difficult it is to infuse a systemic, as opposed to an incremental, innovation.

Introducing Business PROCESS orientation when the processes are mobile presents an added challenge because data flow between the resources (such as Sales Executives and Service Engineers) are envisioned to act as members of dynamically formed and informed, competent, empowered, self-managed teams.



Selling and Delivering of Field Service are highly event-driven suggesting state-flow as a preferred model for MPS (2) and (6). State-flow is essential if 'Human-Assisting' Systems are to be superseded by 'Human-Assisted' Systems (4).

## 5. SEPARATION OF QUALITY AND PRODUCTIVITY

The difference between dreams, hallucinations and visions is that vision includes a plan to reach the goal.


The mission - namely to 'Make the Mobile Process Service market' - will be accomplished if the PFCN VISION, namely Profitable Fulfillment of Customer Needs (PFCN) is realized.

**PFCN vision**

**IF**  
B2B, mobile, event-driven processes - such as selling and delivery - are engineered, then conducted by dynamically formed and informed, self-managed, empowered, competent teams

**AND IF**  
agreement can be reached about how to share the created value

**THEN**  
high process Quality and Productivity will result in Profitable Fulfillment of Customer Needs.



Sooner or later the vocabulary MUST be standardized – especially Quality and Productivity. Integrated Marketing has adopted Sohlenius' definitions (21) in which Productivity can be seen as a reciprocal of cost (and time) of conducting the process:

$$\text{EFFECTIVENESS} = f(\text{Quality, Productivity})$$

All this is easier understood by considering where Quality and Productivity is manifested in a Profit & Loss statement. The S-curve notion is easier to explain with Cost of Goods and Services (CG&S) as a variable because it is Cost, rather than Productivity, that appears in a Profit & Loss statement:

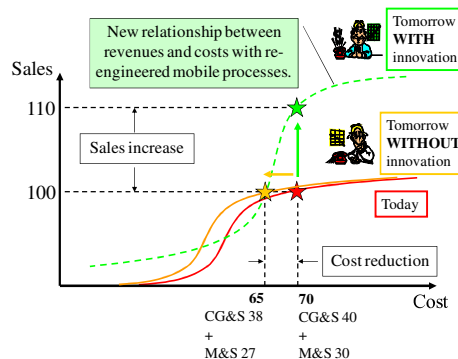
**PROFIT AFTER KAIZEN OR INNOVATION**

TODAY		AFTER KAIZEN	AFTER INNOVATION
100	SALES	100	110
40	CG&S	38	40
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60	GROSS PROFIT	62	70
30	M & S	27	30
20	ALL OTHER	20	20
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10	NET PROFIT	15	20
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The manager in the picture seems to be frustrated because he can foresee only a 50% increase in profit by a Kaizen approach.

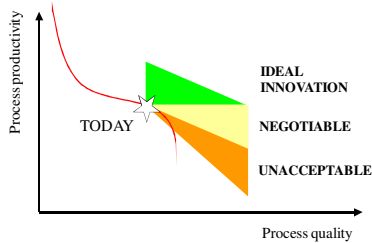
With insight he sees a way to double profit by applying innovation in which re-engineered processes, as enabled by MPS, generates a new relationship (curve shape and displacement) between Quality and Productivity.

**S-CURVE SHIFTS AFTER KAIZEN OR INNOVATION**

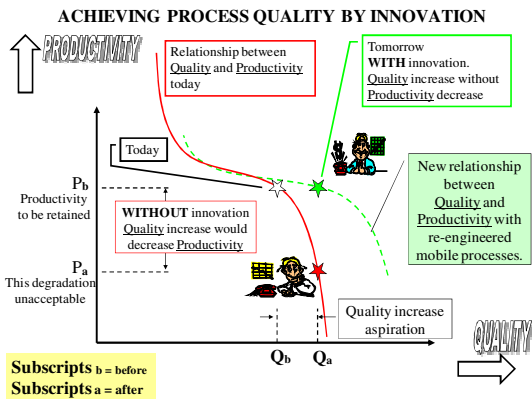


Getting better Quality without sacrificing today's Productivity

ASPIRATIONS FOR PROCESS QUALITY INNOVATION  
Quality gain constrained by productivity requirement

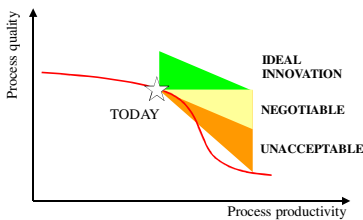


A process innovation, **enabled by MPS**, that shifted the Quality/Productivity curve to the 'Tomorrow with Innovation' shape, would give a wide range of achievable superior qualities with negotiable productivity degradations.

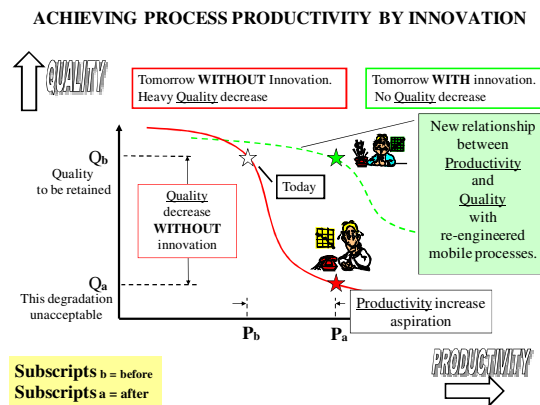


Getting better Productivity without sacrificing today's Quality

ASPIRATIONS FOR PROCESS PRODUCTIVITY INNOVATION  
Productivity gains constrained by quality requirement



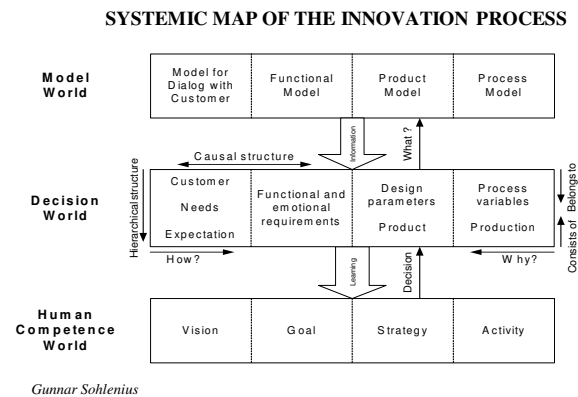
A process innovation, enabled by MPS, that shifted the Quality/Productivity curve to the 'Tomorrow with Innovation' shape, would give a wide range of superior Productivities with negotiable degradations of Quality.



A 'Draining the Swamp' internal document by Integrated Marketing shows the relevance of the S-curve nature of the Quality/Productivity relationship (17).

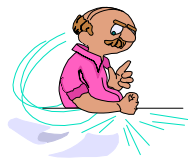
## 6. BOARD GUIDELINES SET SCENE FOR INNOVATION

Constraints on paper length prevent presentation of Systemic Innovation. That subject is published elsewhere (20).



However, before Innovation can begin it is necessary for the Board to formulate a directive. This aspect was addressed at a conference hosted by Ericsson Mobile Communication and organized by Integrated Marketing Nordic AB at Memory Hotel, Kista 27 November 1997 entitled *'Exploiting radio communication in engineered field marketing, sales and service processes'* (7).

### BETA LAVAL'S TOP MANAGEMENT DIRECTIVE



Acting upon the advice of a strategic business consultant the top management of Beta Laval has formulated a series of directives for the coming fiscal year:

1. **Initiate a transition to being a more process-oriented company** in which processes shall be identified, engineered and subsequently dramatically improved.
2. **Become a more customer-focused company** in which the needs of each individual customer shall be profitably fulfilled.
3. **Further decentralize empowerment of personnel to plan and implement activities** wherein managers act as enablers and coaches.
4. **Exploit modern technology** by applying inductive thinking.
5. **Maintain or improve current profitability level.**

In 2005 Integrated Marketing suggested (18) that the equivalent of a Top Management Directive will be required to 'Make the Mobile Process Service market'. We called it a 'Steering Directive' and that a Virtual Enterprise, Professor Emeritus Kenny Preiss calls it a Smart Business Network (SBN), might be capable of such a 'Mission Impossible' (12). Such an initiative must have strong leadership from a respected organization that might be a potential Customer, Vendor, Government or Academic unit (a university or institute). The hesitation by either of such organizations has been described (9).



## 7. EDUCATION AND RESEARCH AS THE MEANS; WEALTH AND WELFARE OF SOCIETY AS THE END

### Cooperation with industry & National interest

There are strong forces today suggesting that academics should be more practical-thinking and that business practitioners should be more theoretical.

Some universities teach in a real-life environment. It is hard to imagine a better lab than a MPS (mobile process service) project at a time when both process and organization engineering are rapidly moving up to debunk the myth that it's all just about technology.



Cooperation with Industry ....

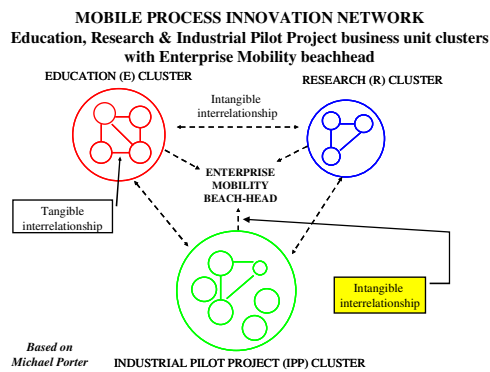
**ACADEMIC INSTITUTION THIRD MISSION  
achieved by  
ENTERPRISE MOBILITY BEACH-HEAD**

INTEGRATED MARKETING  
 $\Sigma M$



### Enterprise mobility beachhead

The power of multi-disciplinary education is emerging fast, but it is essential to also work with sub-sets that overlap for a purpose. In this case the purpose (we call it the MISSION) is Birth of the Mobile Process Service market for the joint benefit of vendors and customers. Conception to Birth concurrent with education is a worthwhile goal. Learn while doing, and do while learning.

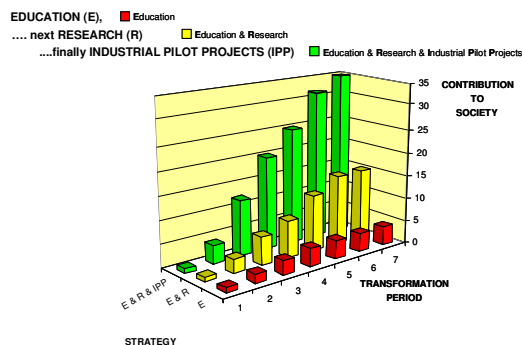


### E, R & IPP transformation period

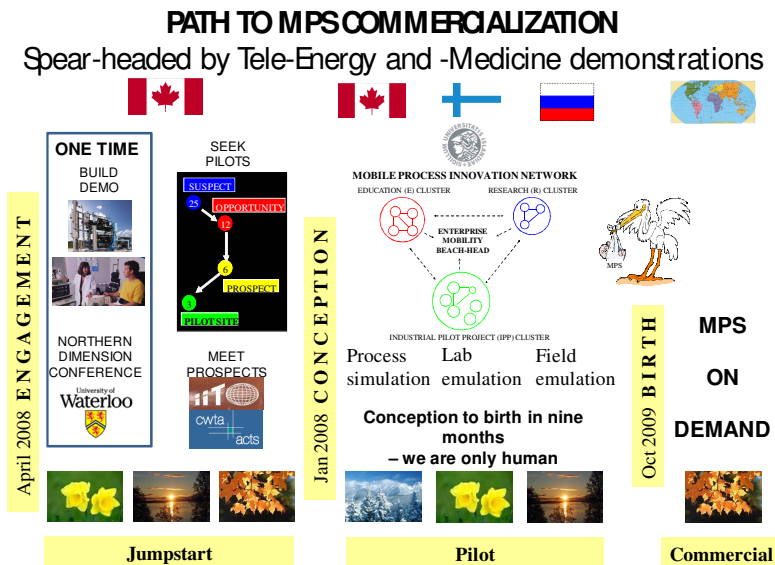
On the basis that research (R) and industrial pilot projects (IPP) require educated researchers and project managers, it seems that initial attention should be given to MPS-oriented education (E). Eventually researchers and project managers will become educators and the synergy between the three (E, R and IPP) will be repaid as high Quality and Productivity of mobile processes.

### SYNERGISTIC ENABLERS OF THE THIRD MISSION

A seven-year transformation period



## 8. AVOIDING PLANNING PARALYSIS



This is a proposal for the commercialization of Mobile Process Service by Autumn/Fall next year – that is by October 2009 (narrated animated reference 16). There would be three phases – JUMPSTART, PILOT and COMMERCIALIZATION. Milestones would be ENGAGEMENT, CONCEPTION and BIRTH. The suggestion is to conduct the JUMPSTART phase in Canada. BUILD DEMO could be completed by August 2008 thus creating a platform for a two-day, multi-national conference to be hosted by University of Waterloo.

At this NORTHERN DIMENSION CONFERENCE, delegates would plan the SEEK PILOTS and MEET PROSPECTS processes. The SEEK PILOTS process, beginning in October 2008, is expected to locate six international end-user PROSPECTS committed to send Task Forces to meet the vendor team Nov/Dec.

The International Institute for Telecommunications (IIT) and/or the Canadian Wireless Telecommunications Association (CWTA) could play Host at the six PROSPECT meetings during which Pilot Projects would be offered. Pilot agreements with three of the six PROSPECTs, has been defined as the CONCEPTION milestone. The three pilot projects could be conducted, in parallel, in Northern Dimension countries as agreed with the three end-user companies – for example one project in each of Canada, Finland and NW-Russia. Alberta Advanced Education & Technology is suggested to consider founding the MOBILE PROCESS INNOVATION NETWORK, possibly through an Alberta Ingenuity award, triggered by an Alberta university, and later other universities and institutes in Canada, the Northern Dimension – or even globally. Each individual pilot project has three stages – Process Simulation, followed by Lab Emulation, followed by Field Emulation. Birth of the Mobile Process Service market occurs with the first commercialization. Conception to birth in nine months – we are only human. Planning paralysis would end if JUST ONE respected party would engage (15)!

9. LIVE DEMONSTRATION

**SEPTEMBER 2008 DEMO SCENARIO:  
TELE-ENERGY IN CANADA & TELE-MEDICINE IN RUSSIA  
ICT Data Centre at TeliaSonera in Nordic/ Baltic**



Build it  
and they will come  
*Kevin Costner,  
Field of Dreams*

Any Operator may provide (or outsource)  
GSM, CDMA or Mobitex Network Services



It is hoped that the presentation of this paper at PRO-VE 2008 in September 2008 can be supported by a live demonstration FROM CANADA, FINLAND and RUSSIA.

A narrated, animated Power-point story-board of the 'Identify Service Need' process was already available for download in March (13). A corresponding animated Power-point of the Russian 'Identify Diagnosis Need' process, as it applies to medical care, has to be constructed as the demo story-board.

The intention is to start building the demonstrations in Stockholm, for debate at a two-day multi-national conference hosted and chaired by Distinguished Professor Emeritus Don Cowan at University of Waterloo, Canada during August.

Demo construction will be monitored by process-oriented software (5) accessible over Internet by all Smart Business Network (SBN) members. This will impart an understanding of process orientation to all SBN members as they observe Assessing, Building-team and Contact-coordination (ABC) during demo construction process.

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