Mobility, Mobile Apps, and Corporate Apps Deployment

A Roundtable Overview

European Chapter
Mobility, Mobile Apps, and Corporate Apps Deployment

Thought Leadership Roundtable on Digital Strategies
An executive roundtable series of the
Center for Digital Strategies at the Tuck School of Business

The European Chapter convened to discuss opportunities for better business performance through the development and deployment of mobile apps, both customer-facing and internal. This Roundtable on Digital Strategies was hosted by Tetra Pak. CIOs were joined by executive colleagues responsible for applications development, internal process design and customer outreach. Executives and academics participating were from ABB Group, Erste Group Bank AG, Hilti Group, Misys plc, Tetra Pak, and the Tuck School of Business at Dartmouth.

Key Insights Discussed in this Overview:

- **Mobile devices are massive game-changers**—significant sources of business opportunity, from the standpoint of internal operating efficiency as well as customer-focused competitive advantage ......................................................... 2, 3, 5

- **Capitalizing on the mobile revolution** requires immense changes in thinking, in strategy, and in execution ................................................................................................................... 4, 5

- **Mobile strategy is being set at a sprint**. Given the pace of demand and the rate of change, leaders must execute quickly—but must operate with a coherent, long-term plan .................... 5

- **The business and use cases for mobile apps are becoming clearer** as new possibilities, processes and user personas for customer-facing and internal apps are defined and priorities are set. Internal apps can drive productivity. External apps can drive revenue........ 4, 5, 6, 7

- **IT must actively manage brand opportunities, impact, and potential complications**—both for consumers, and for the employee value proposition ......................................................... 8

- **Make architecture and platform decisions deliberately**. Develop the core. Support bring-your-own-device (BYOD) legally. Convenience may trump security ............ 9, 10, 11

- **Mobile and corporate apps demand new development paradigms and practices**.
Distribution and marketing matter. Wanted: new governance models. There may be cross-over benefits to traditional, core IT development and even desktop UI design .......... 12, 13

- **Expect new IT organizational and operational challenges and opportunities**. IT has to think about distribution and marketing now. The next “War for Talent” will be fought on smart phones ................................................................. 14, 15

- **Conclusion: Stay flexible, but you have to be in the game learning**. In an immature area, with ongoing changes in adoption dynamics, standards, platforms, protocols and devices, smart IT and business leaders will stay vigilant and flexible ................................................................. 15, 16
INTRODUCTION

Based on the exchanges at this Roundtable, the hand-held revolution in enterprise IT—ushered in by the explosive growth in consumer use of smart phones, tablets and apps of every kind—may well prove to be the greatest cross-over trend any of us see in our technology lifetimes.

From greater customer intimacy and higher levels of service, to manager and employee self-service apps that fine-slice formerly unavailable “down” time for greater productivity, mobile apps are sparking a revolution in IT re-ideation, inside and out.

The simplicity and ease of engaging an “app” for a specific purpose offers immense appeal to anyone with a few extra minutes, or an important customer to impress. And the strategic, branding, customer intimacy, competitive and operational benefits of apps are only starting to become evident.

Whether consuming content and conducting transactions on the move, reviewing pricing with a prospect, ordering or specifying, or handling administrative approvals—managers, employees and customers seem primed to take advantage of the flexibility in thin-slicing their time and closing out tasks that ubiquitous mobile devices now make possible.

But from the standpoint of both strategy and execution in mobile and apps development, the bar that has been set by consumer-facing apps precedents is a very high indeed. This is not a fault-tolerant environment.

Customers expect the same quality of user experience in viewing and acting on information from the enterprise through corporate mobile apps that they’ve learned to enjoy and have grown accustomed to with B2C apps. In the market for user attention, the gap between corporate expense report approvals and a video game like “Angry Birds” will take a while to close.

The Roundtable convened in Sweden to discuss the significant business opportunities and challenges presented by mobile apps, from the standpoint of internal operating efficiency as well as customer-focused competitive advantage.

Opportunity: Game-changers in Small Packages

The CIOs and their business counterparts all seemed acutely aware of the arc of the demand curve—and, the need for a steep learning curve—in developing mobile apps of every conceivable kind.

The consensus was that mobile and apps, far from being hype, are here to stay—no matter how a firm happened to have initially entered the mobile arena.

“Six months ago,” CIO Andy Tidd of ABB Group began, “someone had the crazy idea of giving each of our executive committee members an iPad. I think this sent a message throughout the organization, saying that the future is here. Ever since, there’s been a massive amount of discussion around mobile applications. And we’re starting to see people impatiently waiting to get applications up and running.”
The usual hype cycle that drives new technology adoption may actually be user- rather than vendor-driven in the case of mobile apps, according to Eric Johnson, Director of the Center for Digital Strategies and Professor at the Tuck School.

“So many times the hype far outstrips the adoption,” he said. “And we’ve all been through this often. Technologies get heavily promoted, and then adoption follows. What’s been amazing about this cycle is that it’s really quite the reverse. Just three years ago 95 percent of Internet-connected devices around the world were in Windows boxes. That’s dropped to less than 50 percent. It’s almost unimaginable that something could change so fast.”

He continued, “It’s very much a grassroots kind of thing. Every part of the organization now looks at mobile and apps, and sees something completely different in terms of use cases and ideas. It’s coming from every direction so quickly. It’s really quite astounding and exciting. I think it may be the biggest change in our careers, in terms of what IT looks like in the enterprise.”

Hans Brechbühl, Executive Director of the center, framed this context with some remarkable figures. “There are six billion mobile phone subscriptions around the world now,” he said. “That’s just one billion short of how many people there are on Earth.”

“Think about the speed with which tablets have moved in,” he said, “particularly the iPad: 55 million sold in its first two years. The push is coming from the consumer side. I don’t think this was the case in other technology innovations we’ve adopted during the course of our lifetime.”

“It’s remarkable,” agreed ABB’s Tidd. “People are prepared to spend their own money to be able to carry these things around—and to me that’s quite incredible, that people are committed enough to this technology to be prepared to do that. Which is one of the main reasons that I think this is not just hype. This is real. It’s taking off.”

**We Have an App for That: The Machine as Messenger and Message**

Over the course of the day, there was extensive discussion about the impact that these devices—and the variety of internal and customer-facing apps they enable—are having on every facet of enterprise IT, business process, and the very value proposition and branding of the firm itself.

“People see the iPad and tablets as such an engaging device now—there’s an aura of excitement about them,” said Tidd. If we can take our products and services and present them in a very simple way through a tablet, and then have the connection from the interface through to the backend systems, it’s just seen as a fantastic way to make a big step forward in terms of the customer interface and the efficiency of getting an order from the customer to the backend.”

Mark Seall, Head of Global Web Management for ABB Group, illustrated the range of opportunities that mobile and apps now present the enterprise – a range of examples, both internal and customer-facing, for generating greater intimacy and productivity with stakeholders of every kind.
“We had a big push last year to do a guest relations app,” said ABB’s Seall. “We also went to work and delivered an annual report app for investors, and a corporate information app for all stakeholders with an interest in ABB,” he said. “And even for something you’d regard simply as a branding opportunity, the value is there.”

“For example,” he continued, “when we look at the amount of money we spend today producing corporate videos, and we look at the cost of video production and the amount of engagement it gets, a good video could cost you $300,000 to produce, and you get 2-1/2 minutes of engagement. Looking at mobile gaming and some of the possibilities there, where we can gain several hours of user engagement, that’s something we’d never have gotten from any other kind of material we’ve put out.”

And on the e-commerce front, Seall noted, “We see Eaton Powersource [for web commerce] as providing the ‘wow’ factor we’ve been looking for—for a long, long time.”

From greater customer intimacy and engagement, to higher levels of customer service, to fine-slicing employee “down” time for greater productivity—customer-facing and internal apps are enabling companies to generate entirely novel forms of interaction and transaction.

Apps and mobile platforms now allow the enterprise to do things for—and with—customers that simply weren’t imagined or couldn’t effectively happen on PCs and desktops.

**Mobile and Apps: Set Your Strategy at a Sprint**

But capitalizing on the mobile revolution requires immense changes in thinking, strategy and execution. And priorities and direction must be set, even as the technological ground continues to move beneath the enterprise at an astonishing pace—an experience that sounds akin to sprinting while staring through binoculars.

Given the pace of demand and the rate of change, leaders must execute quickly—but operate with a long-term, coherent plan—leveraging the back-end and core data through various hardware and apps platforms effectively.

“We need to compete in terms of real innovations, fresh ideas and also in terms of time to market,” said Christian Berger, Head of Group Org Retail & Corporates at Erste Group Bank AG. “We are currently going into a very severe transformation process in order how to speed up gathering new ideas, transforming those new ideas to prototypes and new solutions.”

Per-Åke Tobiasson, Head of Tetra Pak’s Global Process Office, identified with ABB’s experience, where mobile became essential after their executive committee got iPads—suggesting that in this domain, there are times when execution gets ahead of direction.

“Two years ago,” he said, “we handed out 200 iPads to the top management team. And without a strategy, it was more like a Christmas gift. Now, afterward, we’re intensely focused on developing a clear and effective mobile strategy.”
“It’s an important challenge, figuring out how to manage getting things out quickly, while having a coherent long-term plan,” agreed Tim Goodhind, Senior Director for Solutions Consulting at Misys.

Hilti CIO Martin Petry laid out the overall landscape for mobile and apps strategy early in the conversation. “There are two dimensions,” he said. “One is inside, internally, where we have 10 thousand employees in the field and direct sales force. There’s a need for information exchange both ways—so we address that with internal mobile initiatives. And on the outside, we have more than 1.5 million customers. They expect us to be approachable, with newer ways of communicating. Through that, we also seek a gain in productivity that touches everything we do, and which doesn’t consume resources in the call center.”

**Corporate App Priority One: Productivity**

The business and use cases for internal mobile apps are becoming more evident, as new possibilities, processes and user personae are defined and priorities are set. This puts a premium on user-centered design and development, generating more sophisticated levels of understanding about user personae within and beyond the boundaries of the firm.

As Misys’ Goodhind put it, “Given different devices for different needs, we need to take a more user-centric and roles-based approach, rather than an application-centric approach and utility based approach to app development.

Much of the conversation about internal corporate apps focused on opportunities for greater employee productivity—in front of customers, as well as during what was formerly (if not nostalgically) regarded as “dead” or “down” time.

Hilti Group’s SVP of Market Reach, Kerim Can, said, “About half of our organization of almost 10,000 team members are in a direct sales function, out with the customers on a daily basis. And when they stand in front of the customer, these devices provide opportunities—opportunities we clearly also want to leverage from a productivity point of view.”

The ability to take tasks typically done in front of a computer and push them to new locations, to use up dead time was also a priority for ABB. “Internally,” said Andy Tidd, “executives need to do lots of approvals and other bits and pieces,” he said. “We now give them the ability to do that on the train, plane, at the airport.”

ABB’s Seall agreed. “On the internal front, but outside the office, we have all of these people on trains or just sitting at home on the sofa, or just out and about doing things and thinking things. When they can share ideas and communicate with each other in a fresher, more original way, it’s very powerful. We see a lot of new behavior in the mobility layer.”

Jerry-Qing Yuan Li, CIO for ABB Group India, observed that “This is not just presenting or delivering the same information through a different channel. Because of the nature of using the phones, it’s a very convenient and easy to access this information. Apps are more than just bringing a miniature version of the desktop to the device. It’s working in a very fragmented time slot, when everybody’s just got five minutes. So this actually is changing a lot of people’s behavior.”
“How do you think about the culture change that these devices bring?” wondered Tuck’s Brechbühl.
“What about the whole question of work/life balance that people are trying to achieve? Or is it
work/life integration?”

Tetra Pak’s Tobiasson said “A lot of this is about using the down time at airports, trains and so on. People really appreciate that. I think mobile and apps are just making it so much faster to connect and get things done, compared with starting up the laptop and sitting there watching it beep and blink and so on. So the internal productivity factor was raised a lot by our top management.”

Not every participant made productivity the priority use case, however.

“In our strategy document,” noted Stefan Lundblad, Senior Architect for Tetra Pak, “we said our main purpose with mobile apps wasn’t productivity. Our main purpose is to increase the sales of maintenance, and strengthen key account management. But that said, when top management got the presentation and discussed the business case and benefits, a lot of it fell back to factors around their personal productivity. Which is of undeniable benefit at every level.”

Lundblad continued, “We’re focused on supporting people in the field with the key account management, the service organization and top management that are fully mobile. We’re focused on identifying where we can deliver the greatest benefit—and what the difference is between work that must be done on the laptop, and work that can be done on the smart phone or tablet.”

**How Apps Help the Enterprise Sell**

Beyond internal corporate productivity, other business cases for mobile apps are demonstrating a direct contribution to revenue.

“For a new salesperson, we’re a complex organization to get started in,” said Hilti SVP Kerim Can. “The simpler we can make it for our sales force, the better—and the more revenue we’ll generate. A device like an iPad really forces simplicity. So the more you can leverage these types of devices, the easier it is effectively integrate salespeople into an organization and help them be productive.”

Said ABB’s Tidd, “I saw a presentation from a banking and financial services company that presented their use of iPad. They were able to actually go back and they put a financial services configurator on the iPad and put it into the branch. People would come in, would be attracted by it, and they’d go through the process.”

“The bank was able to show a direct correlation,” he continued, “between the implementation of this app, and the increase in revenue from the particular branches that made it available. So they were able to actually show a demonstrated business benefit in terms of top line growth through the use of the technology.”

“We still have roughly 80 percent of our clients in the category of ‘digital deniers’,” noted Erste’s Berger. “But with all of the data a bank has, he said, “we can help banks approach their customers with new ways to manage their financial lives more effectively themselves.”
In fact, apps may soon change the nature of financial life itself for consumers.

“We’re piloting an app development in Catalonia,” Berger noted, “that seems to be appreciated by both the customers and merchants, to get rid of the physical cash and get people more used to a cashless application with mobile. We’re also setting up pilots in Central and Eastern Europe.. Many of us believe that in four or five years, you won’t have plastic credit cards anymore. This is currently one of the hottest topics in the banking industry.”

On the most sophisticated end of the user spectrum, Tim Goodhind of Misys agreed that effective use of apps can help with customer acquisition. “Unlike the past,” he said, “where if you had a bank account with us, then your son would probably have a bank account with us, now he’s more likely to take the recommendation of who he banks with from whoever’s got the most “Likes” in his community of friends. So all of this is key to capturing that next generation. In Asia, for example, where they are more innovative on the mobility side, there’s a whole strategy focused on this. It’s all very cool and glitzy—but I must admit, they’ve had significant market share capture of the 16-25 age bracket. And obviously, as the wealth shifts generationally, it’s going to go – and once it’s gone, it’s pretty sticky. So it’s crucial to meet them these new customers where they are.”

The Case Must Come From the Top

Across the range of opportunities and business imperatives that Roundtable participants discussed for mobile and apps technology in the enterprise—whether for productivity, sales effectiveness, direct revenue from consumers or customer acquisition and retention—here was universal recognition that the business case for fully-integrated technology requires a long-term and strategic vision, supported at the highest levels of the organization.

As Hilti CIO Petry put it, “To develop a business case for an ERP consolidation or SAP suite implementation, you need to go really far. It’s like bridge building—you need to have the developments on both sides of the bridge to justify the bridge.”

“So there are a lot of things that need to be built on top in order to justify that fundamental consolidation,” he continued. “That has to come from the very top of the company. You can’t just say, ‘This is how I want to run IT’—that would be a complete failure. If you want to have one single system, you need to have executive board support – or at the very least, one very strong player on the executive board, who says, ‘That’s the way I see the future.’ ”

At the Intersection of Technology and Brand

Corporate apps and mobile devices offer significant positive opportunities for a firm’s branding—as well as unintended consequences and complications—both from the standpoint of consumer perception as well as the employee experience.

There was widespread appreciation for the luster that sound mobile and apps execution can offer a brand. Said ABB’s Tidd, “Image is very important. I think that customers, consumers and companies all now expect that by publicly enlisting the use of tablet and smart phone technology, it conveys the impression of a forward-thinking innovative company to stakeholders.”
Agreeing, Tobiasson of Tetra Pak offered a recent example. “We just had a huge exhibition in Germany,” he said, “to demonstrate how good we are compared with low cost competitors. Our exhibition was on the order of four football pitches in size. We were themed as Star Wars, and our competition looked like the Second World War. We used iPads all over the place—and we were able to reinforce that, sure, you can buy material from some of our competitors more cheaply—but we have a lot of other things we bring that add significant value.”

There was discussion of the risk to brands that mobile and apps can generate. For example, Goodhind of Misys noted, “Since banks are relatively conservative by nature, we have to be concerned about the impact to our brand if there’s some scandal with Facebook, and we get some kind of cross contamination.

And there was an appreciation for the need for consistency in apps and mobile development. “From a branding perspective,” said Hilti’s Can, “we need to make sure that all of these applications and apps, particularly the external ones, all look and feel the same, all deliver a consistent user experience. There has to be a consistent perception about what we do.”

But the most extensive exchanges took place around how both IT and branding needs to be more cognizant of constraints, and must work together more effectively. Participants pointed out that it was an additional challenge to integrate branding, especially innovate digital branding, into the process from a governance and speed-to-market perspective. In part this is because external players like Apple dictate certain conditions (such as fonts, etc.) that cannot be changed and may conflict with corporate standards, and in part it is because it is a challenge to integrate internal stakeholders input in a speedy manner.

Emphasized Hilti’s Can, “I think that both branding and IT need to be better prepared for the mobile and apps environment. Once you sort it out and clarify, then you can provide the toolkit and it becomes that much more efficient. Because it’s not about making better proposals. It’s about helping colleagues from the brand side as they stand in front of a completely new challenge.”

**Architecture and Platform Decisions: Develop the Core, and Support BYOD**

There was rich discussion about the merits and extensive investment required to develop an integrated enterprise platform for data exchange with corporate apps.

“Given our current governance model,” said Christian Berger of Erste Group, “it’s a major challenge to reproduce every one of our front end apps for the eight countries we support with some different back ends. Integration is really the hardest challenge in building new solutions for us.”

Tetra Pak’s Lundblad asked, “How do we make sure that we utilize what we’ve already put into our big ERP investment? Will all of these single-function, ‘atomized’ apps spill back into normal development? Instead of having an ERP system that does 2,000 different things, I wonder if we’ll ultimately have one app for this, and another for that.”
Solid Core, Flexible Boundaries

Hilti’s Petry offered up, “We’ve rolled out a total SAP solution for the 1,500 shop locations that we run, with some 20,000-22,000 employees now. So we have to integrate that information into a common, consistent customer experience—whether they come to Hilti Center in Lund, or in Malmo, or to a customer service [center], or if they get a visit from a Territory Sales rep. The customer expects consistent information. That is what we achieve with a global SAP system and global, integrated processes.”

“We have the vision of a solid core with a flexible boundary,” Petry said. “If you haven’t done the work on the solid core, you won’t get very far with mobile apps [on the flexible boundary].”

“Right” said ABB’s Andy Tidd. “Unless you have the core, you’re not able to expose the right kind of backend components and the security components. And that can lead to a little bit of a mess. Our job from an IS perspective is to get ahead—to anticipate that and have the solid core available and all the other bits and pieces so that people can build on a solid platform within a good architecture. And hopefully then it still feels like something that’s quick and easy, and we have the same kind of iterative approach to development, but the complexity is taken away from it.”

Petry agreed. “We’ll maintain a solid core—with SAP and Microsoft Office, for example—and then we have the flexible boundary with other applications. We link these two worlds. The focus is on total integration. For 50 sales organizations, eight plants and headquarters,” he said, “we end up with about 1500 key users involved in regression testing. That is the price of total integration. You don’t want to discuss with your CFO whether the finance numbers are the right ones, or almost right, or the wrong ones. You need total integration for critical backbone processes.”

Support BYOD

On the other end of the platform spectrum—in the end user’s hands—Roundtable participants wrestled with the implications of the bring-your-own-device (BYOD) explosion in the workplace. Various approaches were in play.

Tidd of ABB said, “At the moment we have only BYOD. But that has to change because we’re moving to a couple of areas where we have real business applications that require the tablet. And you can’t ask everyone to go out and buy their own tablet when it’s specifically job related. So we’ll need to make a decision about buying the devices, which will need to stand on its own as a business case. Our policy at the moment is BYOD, but that will have to change.”

“You do have to compensate employees for using their own devices, I think,” indicated Lundblad of Tetra Pak. “At least, that was the answer I got from our legal department. I think the challenge now is that the legislation hasn’t really kept up with behavior.”

Petry agreed. “I see tons of open questions here,” he said, “especially with non- reimbursed usage of machines in the business context.”

The group then turned its attention to the optimal purpose for different computing form factors.
The Next Convergence?

Hilti’s Can suggested, “I think it’s a question of time until we move into merging these types of devices.” This prompted some spirited exchange.

Petry of Hilti said, “I’m not so convinced about that. And I don’t see the iPad replacing the laptop.” “I really believe that there are different devices for different information needs,” opined Christoph Goeth, Head of Mobile Applications for Hilti Group. “And currently, I don’t think that it’s really merging together in this one tool, like the tablet. The iPad is an excellent device for reading information—but not for working with it. It’s more of a consumption and light entry device. For more complex work, you’ll still need something like a laptop or a desktop PC.”

Is HTML5 Ready?

ABB’s Seall said, “Something we’re finding [with our e-commerce system] is that in some ways it doubles our maintenance overhead, in that we’re maintaining a very large, complex atomic app as well as this huge spool of product pages. Those product pages need a big overhaul anyway,” he said, “so we’re seriously tempted to look at the HTML5 option as we do that.”

But while there were generally positive expectations regarding what HTML5 will make possible, there was also a recognition that even as apps and web technology cross new chasms, smart businesses never stop loving their laggards.

“We’re looking at a two-year timeframe for HTML5,” concluded ABB’s Seall, “because we have to consider that about 20 percent of web traffic is still on IE6,” to general laughter. “So that messes things up a bit.”

It seemed clear that while HTML5 still needs to move down the maturity curve, these leaders would advise others to keep current and keep experimenting with it, to keep learning as the technology becomes more robust.

Is Convenience Trumping Security?

On the security front, the question of encrypted e-mail came up at several points—standing as an example of the shift in user emphasis toward convenience that may be being prompted by apps.

“I’ve been wondering if we’ve been sending far too many encrypted e-mails,“ said Tetra Pak’s Tobiasson. Quite often when people receive an encrypted email, they simply reply back saying, ‘Please send to me unencrypted, so I can read this.’ So I’m wondering if we should consider relaxing our policy on this.”

Andy Tidd of ABB said, “I sent a confidential email to an exec two weeks ago—and I got an automatic message back, saying that he doesn’t accept encrypted email. So he’s basically said, ‘I don’t want anything encrypted, don’t send it.’ “
“It’s definitely change of behavior, said Tobiasson. “I think you have to strike a workable balance between convenience, productivity and security.”

Stefan Lundblad of Tetra Pak added, “It seems that people are becoming more prepared to increase convenience, at some price in security. It could be that we in the IT industry have made things a little too secure, in some ways. People are really suffering from the loss of convenience and having to deal with all these very secure solutions.”

He continued, “Few organizations really need to protect themselves from foreign governments trying to do intrusion, from a practical standpoint—it’s more the hacker stuff that we need to protect ourselves from. Suddenly convenience seems to be becoming such a strong priority, that people are starting to challenge what we accepted as the truth about the need for encryption.”

New Development Paradigms and Practices Needed

Participants agreed that the process of conceiving, prototyping, developing and refining mobile apps calls for approaches very different from traditional IT development.

Goodhind of Misys set up the apps development question this way. “We have multiple applications built up over a number of years,” he said, “all in relatively specialized areas. How do we ensure that we have a consistent development strategy across all of these applications plus our new mobile and apps development? How do we ensure we’re propagating ‘build-once-and-leverage’, rather than solving an immediate problem but then ending up with an unreusable thing?

As Hilti’s Petry pointed out, “The entire process of development is different with mobile apps. It has a different cadence. There’s much more end-user interaction early in the design and storyboarding, and much faster prototyping.

“One of the beauties,” he continued, “apart from the fact that you obviously need the structure and the architecture in place to support mobile apps, is that from a development standpoint you can effectively decentralize development—because the projects are small and generally discrete.”

This decentralized approach has, for some of the participants, led to a rethinking of where and how every aspect of development is done. Moderator Brechbühl shared examples of employers who opened new facilities to recruit and retain the best talent more effectively. “Bechtel and Adidas,” he noted, “have gone the route of saying ‘We need a skunk-works, to be located where the talent is. Their skunk-works are not where the rest of IT is—not because they want them to be separate, but simply because if they insisted on putting their skunk-works where the rest of their IT was, they wouldn’t find the right talent to fill it.”

As goes the talent, so goes the technology. “At least as we deal with it today,” said Petry of Hilti, “we have a so-called strategy of ‘atomized apps’—so that every app effectively has to live and stand alone, and not rely on integrations on top of other applications. With that approach,” he added, “we can decentralize development and even give it to students, with minimal risk.”

Christoph Goeth of Hilti responded, “What’s really great about that is that you have the opportunity to try more, and test more things. So if you have a crazy idea, you just put it up into a prototype,
and see how people respond to it. Maybe you wind up investing a week in building up a mock-up,” he said, “and then you throw it away. But on the other hand, there’s the possibility that you have a great idea that you can put into the hands of the sales force, and improve productivity and drive revenue. That’s great. In one week, you can really test and see.”

Tidd of ABB concurred. “It’s not as if we only consider things that cost above $25K US in terms of formal approval. It’s more of an iterative approach, where people go off and say ‘Well, I can just do something, here. I can do it within my approval limits. I can bring in a couple of graduates or interns or someone, and they can build this up. And then they build it and then we move on to the next piece. I think this kind of incremental approach means that a lot of these apps are being developed under the radar.

Hilti’s Christoph Goeth said, “We did this app as a selector for [construction hardware]—an anchor selector—which really was not on the radar and didn’t just pop up. Most of the initiative came from the end user, who wanted a selector where a user can put some variables in, and it specifies the right anchor for your needs. It was built up over about four to six weeks, by some students. And we put it to the iOS market, and that was it.

“But it was based on an existing application that was there for 20 years,” added Hilti CIO Petry.

New Governance Models

This newfound flexibility and iterative development in apps has brought with it a need for deliberate governance, to ensure that a thousand flowers don’t bloom in all the wrong places.

“You could end up with a proliferation of very short-lived potential applications,” Misys’ Goodhind pointed out, “which are then hanging around forever in the corporate infrastructure. And what are you going to do with them? You might start by launching a few things, and before you know it you’ve got three hundred things of which 190 are obsolete.”

“The challenge is trying to put some structure around how this thing develops,” answered ABB’s Andy Tidd, “because it is consumer technology. And because of that, people think that you can just do your own thing. And they’re right. It’s quite easy to go out and hire someone to knock together a product catalog in a very short period of time. But is that the right thing in the long run? I don’t think so. We can end up with lots of isolated systems that all look very different.”

“One of our challenges,” said Erste Group’s Berger, “with 50 thousand employees and about 5,000 dedicated only to IT, is that we have pretty decentralized governance model—meaning a lot of local entrepreneurship—which can make it harder to align on the IT side. Another big challenge is that we’re a traditional bank, so we have quite huge, comprehensive processes to manage—which makes it difficult to achieve a fast time to market with new solutions.”

Hilti CIO Martin Petry described a similarly federalist structure. “We very much work now with competence hubs,” he said, “and we concentrate knowledge beyond country borders. We also address specific needs of the respective area. When you talk about Switzerland, we have a big loyalty approach going. In the Middle East, it’s more a focus on projects. In Dubai, it’s a project-driven marketplace. From a business excellence point of view, the key thing at this point in time is
to enrich the global basis of competencies we have, and to get into more global and regional flavors in there.”

“From an IS perspective,” ABB’s Tidd said, “it’s very important for me to say we don’t want to control this. We want to put some structure around it and we really want to enable our business do the things that they need to do. I don’t want to build a central team that develops all applications. But I want to provide guidance and frameworks and solutions that allow the guys with the good ideas to develop the solutions that will really make a difference to the business.”

You have to have a way to provide a fairly coherent platform,” he concluded,” that looks the same, and functions in the right way, and the connections into the backend system are good, and it’s safe.”

Stefan Lundblad of Tetra Pak shared a framework that the participants found very helpful for visualizing the governance of apps—both those connected to the back end, and stand-alone—as well as those that are for internal as well as external use.

“We’ve decided we really have four distinct kinds of apps,” Lundblad said:

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   Connected to Back-end Systems
        | Governance |
    Standalone App
   | Internal Use | External Use |
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“So this is a quadrant to define the governance responsibility, and who makes what decisions?” asked Jerry Li of ABB.

“Exactly,” said Tetra Pak’s Stefan Lundblad. “If it’s a stand-alone app for external use, with no connectivity to core systems needed, there is no need for IT to be governing the process.”
How Apps Development has Cross-over Benefits for Core IT

The group identified unexpected benefits emerging from mobile and apps development for more traditional core IT development, and even for desktop applications usability and UX.

“I think there is an opportunity,” said ABB CIO Tidd, “to take what we learn out of this process and really apply it back into traditional applications. For us, we have a very fragmented architecture because of the way the company has grown up. So I think if we can find a way to put the structure around mobile apps, then I think that gives us some development competences that we can then push back into the rest of the stack.”

Tuck’s Brechbühl asked, “Will some of the characteristics of the apps world—that ‘atomized’ ability to do a specific thing really efficiently and cleanly with a wonderful UI/UX—find their way back to our desktop or laptop? Or is that likely to stay in the mobile apps world?

Christian Berger of Erste Group said, “Speaking for end users, at least in the banking industry, we do also need to improve in those traditional channels as well. Because you can’t have an extremely good-looking app on your smart phone or tablet, and then on your laptop or desktop, it looks stone age.”

Apps Will Change the Way You Manage Your IT Organization

The participants’ exchanges highlighted how mobile apps are ushering in new organizational, operational and management challenges for IT—as well as some new opportunities, and perhaps even a few new best practices.

To be successful, IT leaders must extend their development and management framework of thinking to include questions of distribution (through corporate and third-party app stores) and the marketing of apps—areas traditionally outside of IT’s concern—because in a world of atomized apps, just building something doesn’t mean your stakeholders will use it.

Can of Hilti Group said, “The larger context of the apps you develop is definitely something you need to master at the end of the day. You can create the best art, the finest technology—but if nobody is aware of it, it will not matter. You will not make a difference.”

“I think this is one of the key learnings we’ve had so far, agreed Hilti’s Goeth. “It’s true. Without marketing, you can have the best app but it’s typically going to get lost under this huge quantity of apps people find in the stores. You simply have to do marketing for something, if you want to drive adoption and prove value.”

Tuck’s Eric Johnson agreed. “We’ve done a couple big QR code campaigns for the apps we developed in the Center. One allows you to kind of see all the technology speakers that come through Tuck. We’ll often video parts of their content, put up some interviews, all bundled into a pretty nice app that we all really like. But as you said, Christoph, you’ve got to market it to get people to use it. And in the case of QR codes, even though they’re ubiquitous, it’s not clear that most people even know what to do with them yet.”
The Next War for Talent Will be Fought on Smart Phones

The key organizational dimension of the future—what kind of talent an organization is able to attract and retain—was very much on participants’ minds. And mobile apps seem to be regarded as a prerequisite that an employer of choice simply has to execute well. Mobile strategy, it turns out, is a key element of talent strategy.

Tuck’s Hans Brechbühl described a signal example at Volkswagen. “At a strategic level,” he said, “VW has a justification for mobility and mobile apps that I thought was very interesting. Their primary justification is the ability to attract talent—not just in IT but for the corporation as a whole. They’re marching in with these mobile apps, they say, “because we want to be the employer of choice, and it is our belief that to be the employer of choice it is critical in every way that we have a solid mobile strategy, and that we put money into mobile apps.”

Tidd of ABB agreed with this rationale. “Good mobile apps provide an image of a cool place to work. We want graduates, smart people to see that we have good ways of doing things internally. We want them to understand that we’re the kind of company they want to work for. You can’t underestimate the importance of that.”

Hilti’s Martin Petry agreed. “If you ever find yourself saying, ‘We don’t do that,’ lots of talented people will simply recognize you as a little bit outdated. These guys move in the direction of innovation. They’re thinking, ‘I want to change the game of how information is given out in real time, and I can do that at Hilti.’ Then, when people do an internship, if they make a good impression we invite them onto our team. You have a different discussion when you and the candidate have both had a substantive opportunity to assess fit.

”We really need to continue reaching out for new talent and fresh ideas for new solutions,” agreed Christian Berger of Erste Group. We strongly believe that this means we can also attract new talent for the organization. That could be a challenge for a typical bank. But we believe we can motivate those people to work for the kind of spin-off we’re planning now.”

Tuck’s Eric Johnson, “Mobile really gets rolled into their assessment of the culture of the company. And I think that has a huge impact. It doesn’t matter how profitable the company is, or even how much they were being offered in salary, if they don’t have a clear sense that the future is being created in your firm.”

Conclusion: Stay Flexible

While the potential and opportunity surrounding mobile and apps development was clear to all participants, there was broad agreement that this is still a very nascent and immature area.

Changes in adoption dynamics, standards, platforms, protocols and devices are happening at such a rapid pace that IT and business leaders would be wise to stay vigilant and flexible as new possibilities, platforms and priorities evolve.
“I remember a very bad market read we did two years ago,” said Hilti’s Petry, when we finally gave in and said okay, let’s support Netbooks instead of laptops. One year later everybody came back and said, ‘Why did you guys give us these Netbooks? I mean yes, they are cheap but the low performance, they are too small and too complex. Guys, we need something else.’ That was a very short life span that hardware had.”

Erste Group’s Berger noted, “We could not imagine two years ago that there would be some browser-based solution that could give you the same user experience as a native application. But the possibilities are picking up even faster with mobile apps, from everything we see. So it’s impossible to predict where the expectations will go next.”

“At the end of the day, said ABB’s Andy Tidd, “you want a connected app. A complex, connected app that’s simple to use, with the right connections and separations between the back end and front end. In that regard, mobile is just another channel. It’s just another delivery device like the Web, or like other applications that we might build with a GUI or a Web interface anywhere. And I think that’s it’s around the conception and design of the user interface that we need to be able to be more agile and more iterative.

Added Kerim Can of Hilti Group, “These devices really are game changers. When you master it correctly, you have a competitive advantage in your hands. It’s very motivating to think in that direction.”

Tidd of ABB summarized, “Listening to everyone around the room, we’re all dealing with the same problems but we’re all finding solutions in different ways, using different technologies and different devices. This reinforces to me that this is still an immature area and that there will be significant changes coming up. We will need to retain some flexibility.”
### Participant List

**Mobility, Mobile Apps, and Corporate Apps Deployment**

**26 April 2012**

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<thead>
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<th>Name</th>
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