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BUSINESS TECHNOLOGY PERFORMANCE INDEX 2019/2020



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Preface

We are proud to present the **2019/2020 Business Technology Performance Index** in collaboration with the ELFA. This 17th annual edition of the BTPI provides insight into the technology trends and forward-looking initiatives that Equipment Finance companies have begun, are anticipating, or have recently completed in efforts to drive their firms into new markets, new opportunities, and more efficient operations.

We believe the findings in these pages can help in constructing operational business plans and the creation of new technology strategies to support those plans.

Cordially,

Michael Donnary

Senior Director

Capgemini America, Inc.

Michael E. Baez

Director

Capgemini America, Inc.

Executive Summary

In our previous edition of the BTPI report, we had transitioned from the “theoretical” to the “practical” around emerging technologies such as Robotic Process Automation and Artificial Intelligence and the competitive advantage gains that these technologies can bring to organizations in the equipment finance industry. This year’s report takes a different turn in exploring an emerging paradigm across the equipment finance industry.

While current technology platforms may be adequate to run the business today, many organizations are faced with legacy technology that is costly, fragile, not scalable and operationally inefficient. At the same time, many organizations are no longer seeking “silver bullet” monolithic end-to-end platforms to address those concerns. They also are not limiting themselves to just connected Front-end originations and Back-end servicing platforms, but rather are creating ecosystems of cohesive “best in class” platforms and partners along with a robust set of open APIs in order to bring core capabilities to market. In this year’s report, we introduce this concept as the “Connected Equipment Finance” ecosystem and will explore how this approach will enable equipment finance organizations with more modern digital platforms to better serve the markets of today and in the future.

As we transition to our Connections section in this year’s report, we look back at last year’s BTPI survey where we asked the question, “What current IT and/or operational related issues are keeping you up at night?” The predominant answer from our survey respondents was cybersecurity. This year we explore how organizations are looking at enabled-AI to help make cybersecurity more manageable, efficient and effective, as well as to further reduce risk. Interestingly, and in what may be described as a year over year trend, cybersecurity is also seen as one of the main challenges that respondents foresee in implementing Connected Equipment Finance capabilities for their organization.

Our report concludes with our BTPI survey response data which focuses on the respondents’ rating of internal capabilities in terms of IT and operational abilities and providing insights into the current thinking of market-leading equipment finance organizations.

Connected Equipment Finance

"There has been a paradigm shift across the industry whereby organizations are no longer looking for 'silver bullet' end-to-end solutions..."

The Connected Equipment Finance Ecosystem – A New Paradigm Shift

In the 2018/2019 BTPI report, we explored how equipment finance organizations and solution providers are no longer just focusing on either core Front-end or Back-end platforms but are evaluating across their entire ecosystem when thinking about integration and system replacement. To that end, we introduce the concept of the "Connected Equipment Finance Ecosystem".

Connected Equipment Finance is an architectural concept which centers around addressing the capabilities needed by equipment finance organizations through an ecosystem of platforms and partners to provide robust capabilities to drive growth, operational excellence and customer satisfaction.

There has been a paradigm shift across the industry whereby organizations are no longer looking for "silver bullet" end-to-end solutions or monolithic Front-end and Back-end platforms, but rather an ecosystem of partners and platforms.

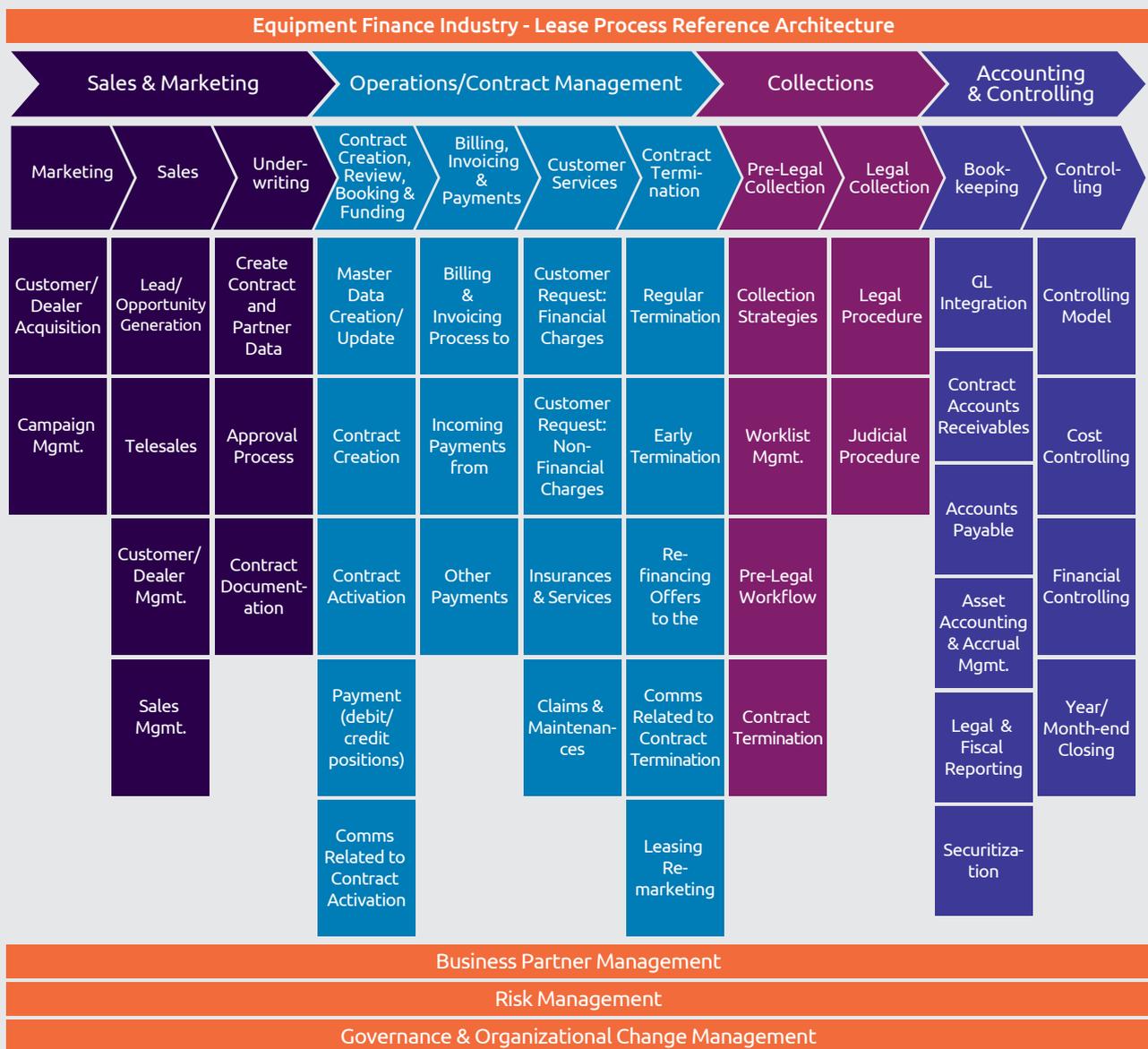
This is being driven by a transformational shift in order to provide the capabilities needed by all constituents across the lease transaction lifecycle (e.g. vendors, end-user customers, partners, subscribers, third parties and employees). The rationale for this capability transformation includes, but is not limited to a need for:

- Improved time to market for new products and services
- Flexibility with appropriate controls
- Regulatory and risk compliance
- The ability to bundle and unbundle products and services
- Flexible consumption models
- Ease of integration with third-party systems
- High availability, scalability and performance
- Standardized out of the box processes
- Digital self-service

Traditional Reference Architecture Versus Connected Equipment Finance Ecosystem

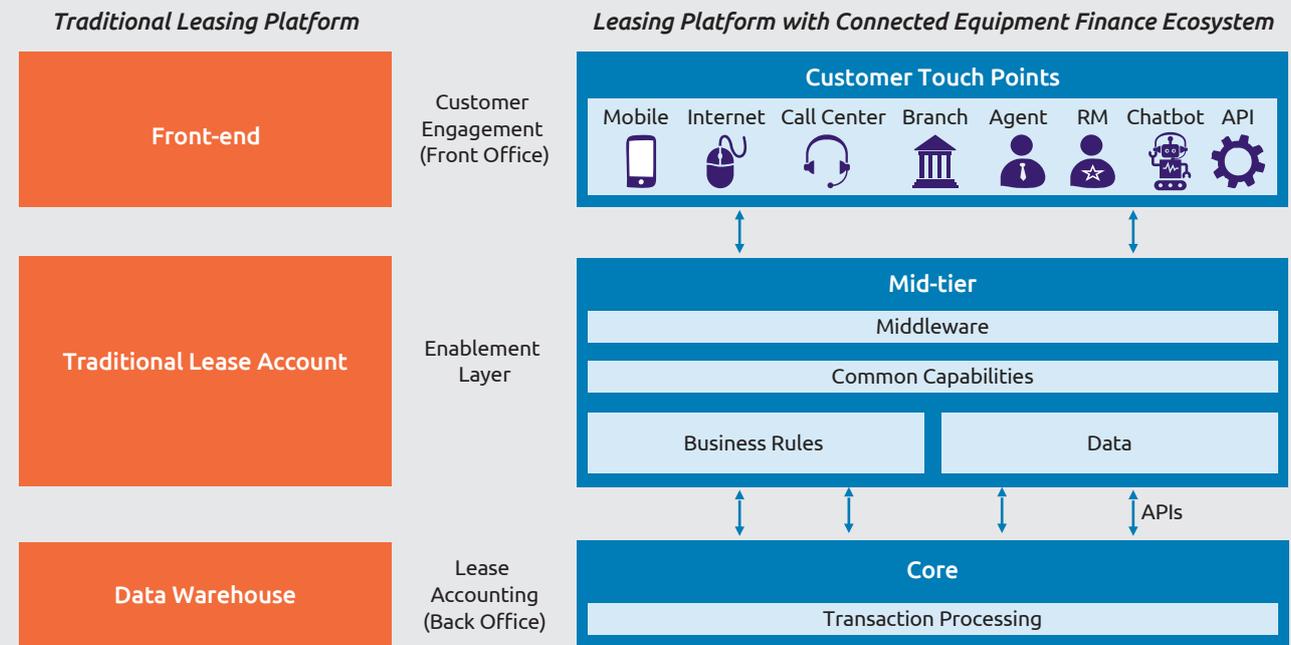
From our years of experience, we have created an overarching Lease Process Reference Architecture for the Equipment Finance Industry. It is meant to capture all the possible functional processes across the lifecycle of a lease. These functionality requirements remain valid and true, however what is changing is the approach around how to solve for the technology.

Figure 1. Industry Best Practices



Below is a model comparison between the tradition leasing platform and a continuously evolving ecosystem model.

Figure 2. Traditional Architectural Model vs. Connected Architectural Model



Connected Equipment Finance will enable a more contemporary model including a modern, digital, open API platform to address future needs and remain ahead of competitors in the markets we serve today and, in the future.

Now, more than ever, a digital, opti-channel, ecosystem model must be considered.

Historically the structure was quite straightforward, a Front-end and Back-end platform, as well as a data warehouse being the key components. However, the future is being driven by the ability to provide the capabilities, services and flexibility that customers are demanding. As Capgemini’s 2018 World Fintech report states, customers who a decade ago were content with traditional 9-to-5 financial services now want 24/7 online access that is personalized, fast and accessible from any device, anywhere. Providing this service level to customers is the new imperative, which will require unprecedented levels of innovation – not only to grow and be competitive, but simply to survive.

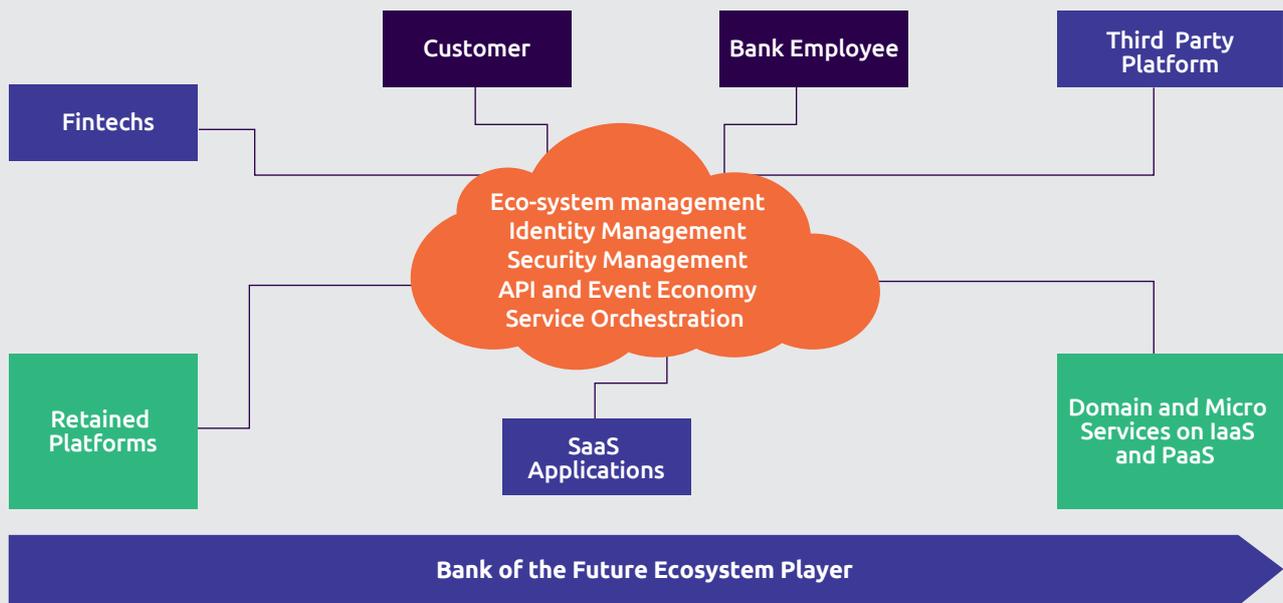
In order to achieve such levels, the mix has changed to retaining your core system for transaction processing. The enablement layer that interfaces with that core becomes critical in that it contains a combination of common capabilities, middleware, data and business rules which connect via API’s to all the internal and external systems. On top of the ecosystems sits the customer engagement layer which is meant to allow the true digital, opti-channel experience our customers expect.

Now, more than ever, a digital, opti-channel, ecosystem model must be considered. Opti-channel engagement is the marriage of two of today’s hot topics in customer engagement: journey mapping and big data.

In an opti-channel experience (the current best practice, customers should be able to engage with you on any device through any channel at every step along a journey. With an opti-channel engagement strategy, you determine the optimal channel for each customer at each touch point.

The demand for customer-centric innovation has led to the rise of Fintechs – agile companies that bridge the gap between the services offered by traditional financial service organization and the emerging demands of today’s customers.

Figure 3. Future State Architecture of a Connected Equipment Finance Organization



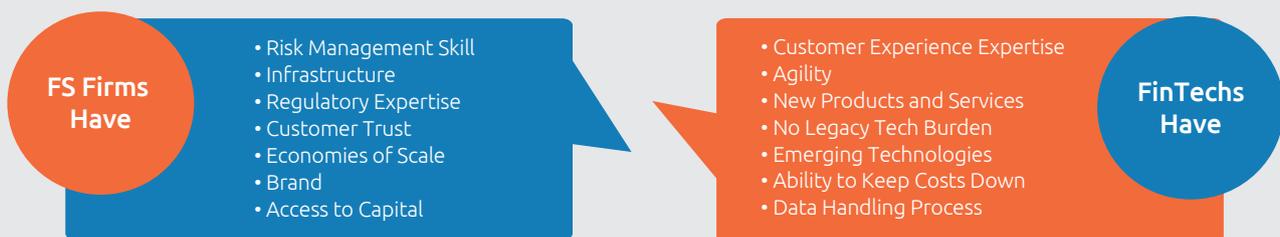
Together, FinTechs and incumbents can meet emerging customer demands and prepare for and compete with the potential market entry of BigTechs.

In today’s world, Fintechs are innovating with emerging technologies and delivering the solutions and services customers are expecting. In doing so, they are rapidly transforming the financial services industry.

The competition for customers between Fintechs and traditional financial services firms is on the rise. The real market opportunity lies in the collaboration between these two entities, each of which brings unique and critical capabilities to the table. Together, Fintechs and incumbents can meet emerging customer demands and prepare for and compete with the potential market entry of Bigtechs.

An interesting quote from Tara Wiley, Head of Open Banking, Citi FinTech from World Fintech 2019 states that “Transformation or re-engineering often takes time. Partnering with a FinTech should accelerate the delivery of a new solution, allow for a pivot if a new opportunity emerges, and/or if consumer preferences change. Fintechs and other service providers are able to supplement banks core offerings and enrich traditional products.”

Figure 4. Success through collaboration



Source: World FinTech Report 2018, Capgemini, LinkedIn, Efma, 2017

Adoption Concerns and Challenges

The creation of a Connected Equipment Finance ecosystem within an organization will likely involve change not only technologically, but culturally and from an organizational change management perspective. There are many things to consider when transforming your overall system architecture and the Connected Equipment Finance concept is still in its infancy in the industry. This may remain so for the immediate future but perhaps not for long. While survey respondents did not indicate an immediate plan to move to such an architecture in the near-term (0-3 years), over 50% indicated a desire to do so within the next 5 years and 90% indicated a desire over the next 10 years.

So, where do we see the biggest concerns and challenges in pursuing such a landscape?

Concerns in adopting such a framework:

- Data security
- Customer privacy
- Loss of control of customer data
- Lack of homogeneous tech standards
- Brand dilution
- Product cannibalization

There is certainly some apprehension in moving toward a connected ecosystem. The 2019 World Fintech Report calls out that there is a lack of standards when it comes to the collection and sharing of data, along with uncertainty around regulations. In the 2019 survey, we see respondents agreeing with the concerns in data security, customer privacy and loss of control of customer data at least 80% of the time as shown below:

Concern	Level of Agreement
Data Security	100%
Customer Privacy	80%
Loss of Control of Customer Data	80%

Top concerns with adopting a Connected Equipment Finance ecosystem include data security, customer privacy, and regulatory compliance.

Considering the financial impact fines and loss of goodwill and trust can have on an organization over the mishandling of data, it is no surprise to see such concerns of security and privacy topping the list. It is quite possible to expect organizations to await clarity and standardization on rules and regulations in such areas before diving into a connected environment entirely.

Challenges in implementing Connected Equipment Finance capabilities to the organization include:

- Difference in organizational culture/mindset
- Cybersecurity concerns
- Regulatory compliance
- Lack of long-term vision and objectives
- IT incompatibility between legacy systems and fintech systems
- Process barriers
- Lack of executive leadership commitment

The three largest challenges we saw among survey respondents in implementing Connected Equipment Finance would be regulatory compliance, cybersecurity and IT incompatible between legacy and FinTech platforms as shown below:

Concern	Level of Agreement
Regulatory Compliance	90%
Cybersecurity Concerns	80%
IT Incompatibility	80%

The implementation of regulatory compliance standards and disparities across geographies is a primary concern for any company. Cybersecurity also remains a concern and will be discussed further in the following section of this report. The concern also increases as more systems are sharing more data within any single entity. As with any project, working with legacy systems and pairing with a modern platform on newer technology will prove challenging. Resourcing for a legacy product is often cumbersome as knowledge is localized and the overall capabilities of the legacy system itself will certainly pose challenges as it is paired with modern capabilities.

The Use of APIs

The use of open APIs is picking up steam and is expected to be even more broadly adopted by banks as well as other ecosystem players.

Today, APIs are significant open-banking enablers because they allow third-parties – such as Fintechs and developers – to access bank systems and data within a controlled environment. Information sharing drives innovation and, therefore, collaboration between banks and Fintechs drives customer benefits, experience, and satisfaction.

According to Capgemini World FinTech Report 2019, “A majority of banks (88%) use APIs to connect their internal systems, according to WFTR 2019 participants. APIs help banks connect internal business units and also support intra-divisional vertical communication”.

“The pace of external API sharing is accelerating with 66% of banks saying they currently share APIs with trusted partners and nearly 27% planning to share APIs within a year”

A few examples include:

- A major global bank provides developers with a broad set of APIs to allow authorization management, payment initiation, account and transaction information retrieval, resaving customer card information, sourcing product details, and checking ATMs and branch locations
- A mobile, tablet, and website payment application provides an API that allows developers to access and integrate its functionality with other applications and to create new applications
- Banks leveraging Amazon’s voice-controlled echo device through APIs to provide a conversational interface

The use of open APIs is picking up steam...

66%

of banks saying they currently share APIs with trusted partners and nearly

27%

planning to share APIs within a year.

According to Angie Campos, Global Head of Financial Services, MuleSoft, “APIs are, and will continue to be standardized for two key reasons, improved quality of performance and security; and to better manage, track and coordinate data services for the benefit of the consumer”.

Conclusion

While current platforms may be adequate to run the business today, many organizations face systems that are costly, require use and support of legacy technology, are fragile, not scalable, and are operationally inefficient. There is a need for a new approach. Connected Equipment Finance will enable a more contemporary model including a modern, digital, open API platform to address future needs and remain ahead of competitors in the markets we serve today and, in the future.

Connections: Cybersecurity

69%

of organizations believe they will not be able to respond to cyberattacks without AI.

Artificial Intelligence Helps Reinvent Cybersecurity

Each year we ask our survey respondents to share the IT and/or operational issues that are keeping them up at night. Last year, Cybersecurity ranked #1. At the same time, 85% of respondents indicated that they view themselves as “beginners” or “conservative” in the adoption of Robot Process Automation and Artificial Intelligence. Only 47% of respondents indicated they are either building capabilities around or are exploring potential uses of Artificial Intelligence.

A July 2019 Capgemini study surveyed 850 senior IT executives from IT information security, cybersecurity and IT operations across 10 countries and seven business sectors, and conducted in-depth interviews with industry experts, cybersecurity start-ups and academics.

Key findings include:

AI-enabled cybersecurity is now an imperative:

Over half (56%) of executives say their cybersecurity analysts are overwhelmed by the vast array of data points they need to monitor to detect and prevent intrusion. In addition, the type of cyberattacks that require immediate intervention, or that cannot be remediated quickly enough by cyber analysts, have notably increased, including:

- Cyberattacks affecting time-sensitive applications (42% saying they had gone up, by an average of 16%).
- Automated, machine-speed attacks that mutate at a pace that cannot be neutralized through traditional response systems (43% reported an increase, by an average of 15%).
- Facing these new threats, a clear majority of companies (69%) believe they will not be able to respond to cyberattacks without the use of AI, while 61% say they need AI to identify critical threats. One in five executives experienced a cybersecurity breach in 2018, 20% of which cost their organization over \$50m.

Executives are accelerating AI investment in cybersecurity:

A clear majority of executives accept that AI is fundamental to the future of cybersecurity:

- 64% said it lowers the cost of detecting breaches and responding to them – by an average of 12%.
- 74% said it enables a faster response time: reducing time taken to detect threats, remedy breaches and implement patches by 12%.
- 69% also said AI improves the accuracy of detecting breaches, and 60% said it increases the efficiency of cybersecurity analysts, reducing the time they spend analyzing false positives and improving productivity.

Accordingly, almost half (48%) said that budgets for AI in cybersecurity will increase in FY2020 by nearly a third (29%). In terms of deployment, 73% are testing use cases for AI in cybersecurity. Only one in five organizations used AI pre-2019 but adoption is poised to skyrocket: almost two out of three (63%) organizations plan to deploy AI by 2020 to bolster their defenses.

AI offers huge opportunities for cybersecurity. This is because you move from detection, manual reaction and remediation towards an automated remediation, which organizations would like to achieve in the next three or five years.

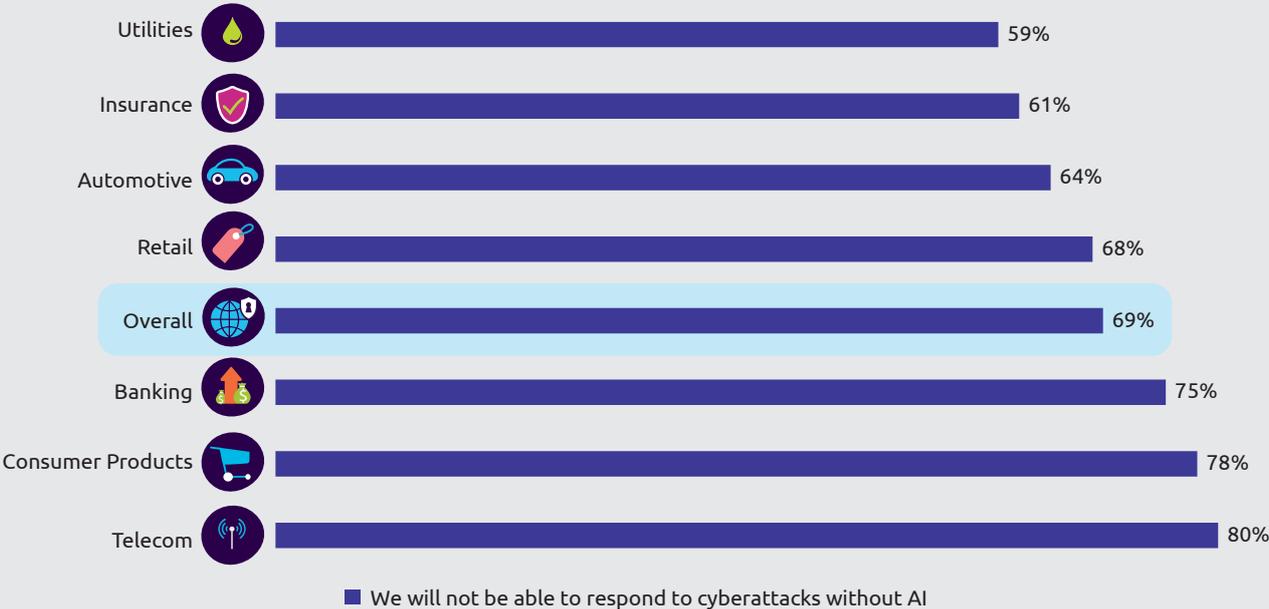
However, there are significant barriers to implementing AI at scale:

The number-one challenge for implementing AI for cybersecurity is a lack of understanding of how to scale use cases from proof of concept to full-scale deployment. 69% of those surveyed admitted that they struggled in this area.

Geert van der Linden, Cybersecurity Lead at Capgemini says “Organizations are facing an unparalleled volume and complexity of cyber threats and have woken up to the importance of AI as the first line of defense. As cybersecurity analysts are overwhelmed, close to a quarter of them declaring they are not able to successfully investigate all identified incidents, it is critical for organizations to increase investment and focus on the business benefits that AI can bring in terms of bolstering their cybersecurity.”

Additionally, half of surveyed organizations cited integration challenges with their current infrastructure, data systems, and application landscapes. Although the majority of executives say they know what they want to achieve from AI in cybersecurity, only half (54%) have identified the data sets required to operationalize AI algorithms.

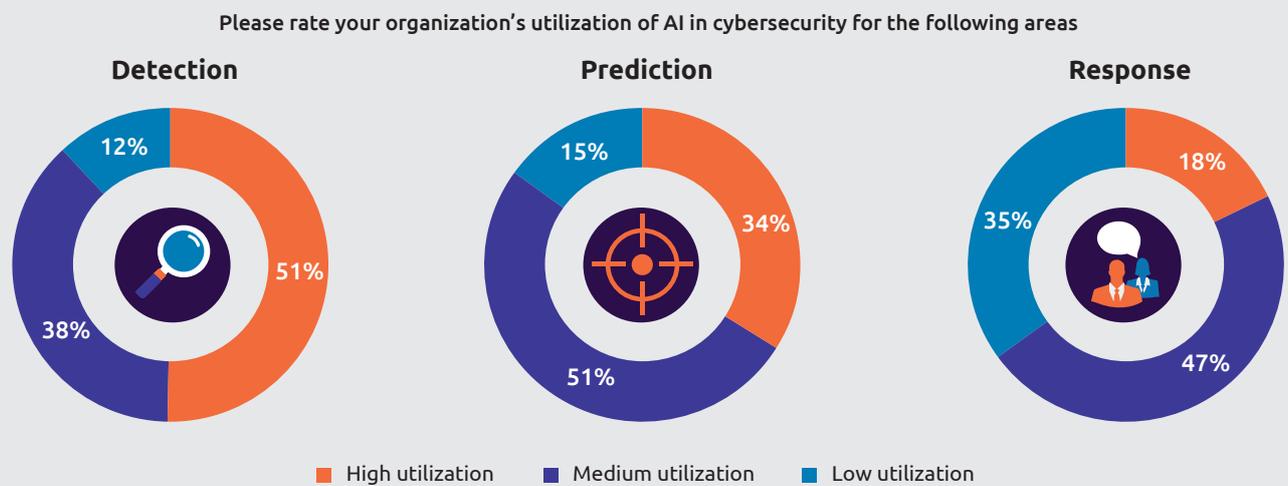
Figure 5. Organizations are counting on AI to help identify threats and thwart attacks



The Increasing Pace of Adoption of AI in Cybersecurity

Under the AI umbrella, the use of machine and deep learning in cybersecurity has been trending upward. With close to three-quarters of firms testing use cases for cybersecurity in some way. Organization executives said network security, data security, and endpoint security were the top uses of AI in cybersecurity.

Figure 6. Adoption of AI for detection, prediction, and response



With network traffic increasing exponentially, it is a growing challenge for cyber analysts to identify deviations in patterns of behavior.

Detection: AI is used extensively to detect cyber threats. This reflects the unique capabilities of these technologies: machine learning or deep learning-based detection allows organizations to continuously evolve detection parameters.

Prediction: More than one-third of executives make extensive use of AI for predicting cyber threats. The AI scans through huge amounts of data of various types to make predictions based on how the system has been trained. Pre-emptive actions can then be taken to avoid attacks.

Response: AI is still at a relatively nascent stage when it comes to responding to cyber-threats. AI can be used to reduce the time taken to create a virtual patch for a detected threat or develop new protection mechanisms for evolving technologies.

51%
share of organizations that have high utilization of AI for detection of cybersecurity threats.

Benefits of AI in Cybersecurity

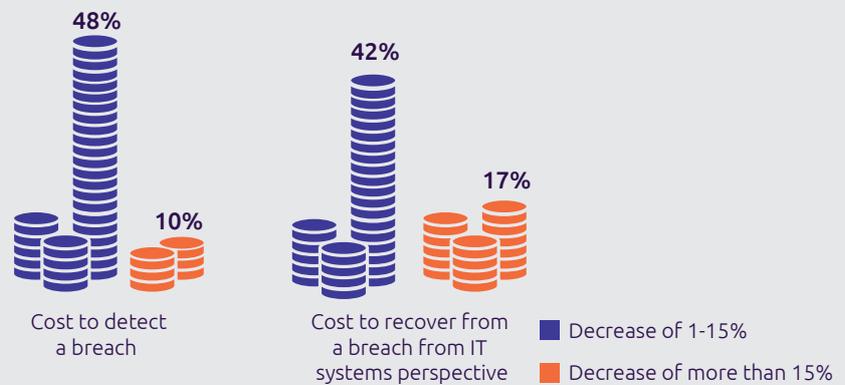
AI lowers the cost to detect and respond to breaches

- Using AI for cybersecurity enables organizations to have an overall reduction in time and effort.
- Two-thirds of executives say that AI lowers the cost to detect and respond to breaches.

AI makes organizations faster at responding to breaches

- Technology determines the legitimacy of interactions by comparing it against all other interactions received.

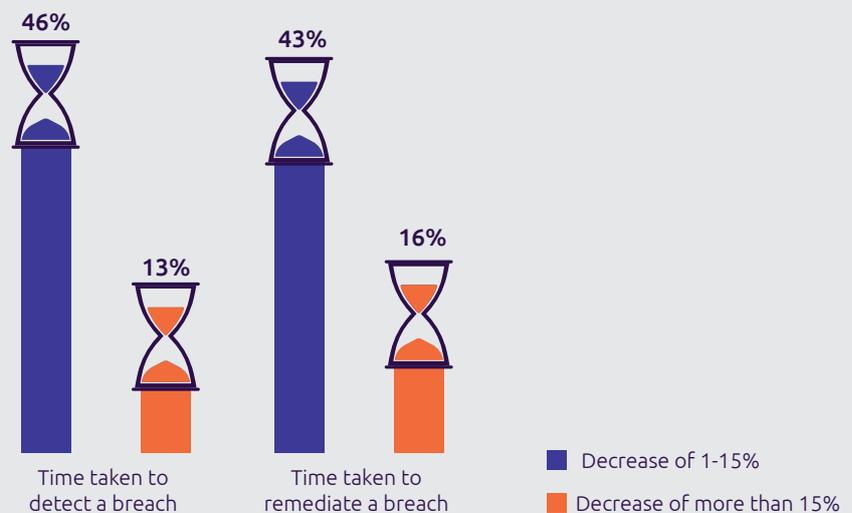
Share of organizations that have experienced time savings



AI results in higher efficiency for cyber analysts

- Three in five executives agree that AI in cybersecurity improves the accuracy and efficiency of cyber analysts.
- AI is allowing for cyber analysts to learn how to detect threats more effectively.

Share of organizations that have experienced time savings



With AI, the overall time taken to detect threats and breaches is reduced by up to

12%

Focal Points of AI Cybersecurity

For equipment finance organizations seeking to optimize value and justify investment in AI-enabled cybersecurity solutions, identifying high-potential use cases to implement initially is key to ensuring quick wins for AI in cybersecurity.

We have recommended a short list of five high-potential use cases for equipment finance organizations that have low complexity and high benefits.

Scoring Risk in the Network

Compile risk ratings scores that are data-driven, quantitative, and that do not depend on domain insights from cyber analysts. The score provides estimates of scaled risks as well as data-driven uncertainty bound, which allows faster prioritization of high-risk threats.

Intrusion Detection

Rapidly detect, analyze and defend against cyber-attacks in real-time through automated, highly accurate insights into malicious activity. New frameworks and research works are coming up to detect intrusions in power-distribution smart grids.

User/Machine Behavioral Analysis

This behavior-based technology allows organizations to detect and block the most sophisticated new forms of cyber-attacks in real time with high accuracy. An autonomous shuttle company is using AI-based behavior profiling and access control to guard the electronic control systems of its autonomous vehicles against hacking.

Fraud Detection

Use machine learning to detect possible fraud threats, reducing financial loss while also enhancing the user experience.

Using deep learning system that analyzes transactions in real time one company was able to reduce its fraud rate to just 0.32%.

Malware Detection

Use of previously identified characteristics of malware to predict potential future malware infections that signature-based approaches may not be able to detect.

Top players in the oil and gas industry use AI and harness real-time sensors data from machines to intervene and avert potential problems and failures.

Implementing AI in Cybersecurity

The number-one ranked challenge was a lack of understanding of how to scale use cases from proof of concept to full-scale deployment. Below are the steps for building a roadmap for implementing AI in cybersecurity.

Identify data sources and create data platforms

Organizations also need to ensure the data is up-to-date and complete if they want a high-quality output.

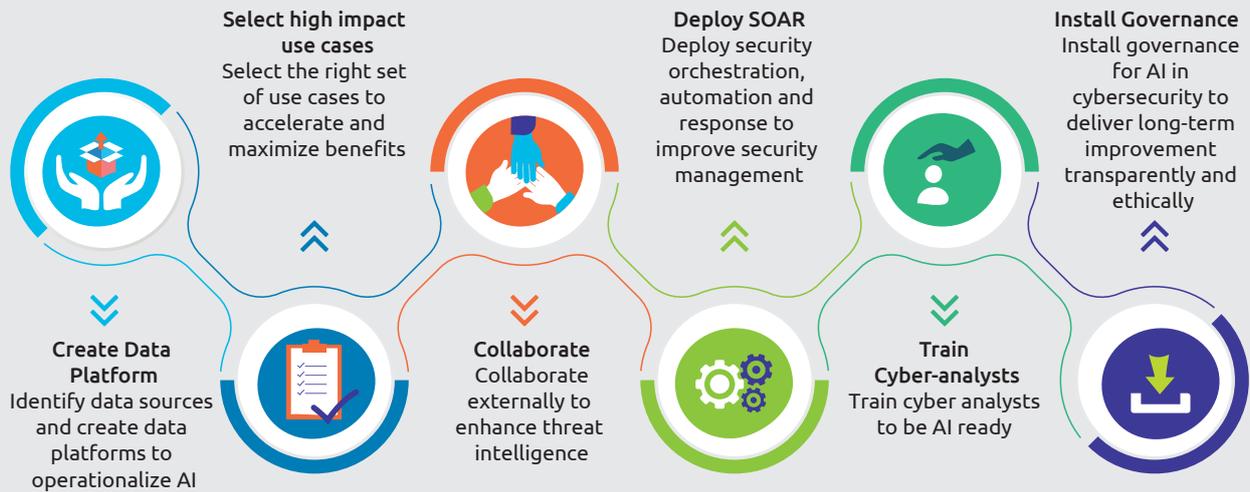
Select the right set use cases to accelerate and maximize benefits

Focus initially on use cases where the data is complete and frequently refreshed.

Collaborate externally to enhance threat intelligence

Collaboration with threat researchers or security professionals who are not employees through crowd-sourced platforms is essential.

Figure 7. Building a roadmap for implementing AI in cybersecurity



Source: Capgemini Research Institute analysis

Deploy SOAR to improve security management

Security orchestration, automation and response (SOAR) allows incident analysis and triage to be performed, leveraging a combination of human and machine power.

Train cyber analysts to be AI ready.

Upskilling employees whose roles are affected by technology advancements, which will allow them to draw on their knowledge from the company.

Install governance for AI in cybersecurity

Allows for long-term improvement transparently and ethically.

Conclusion

Organizations must first look to address the underlying implementation challenges that are preventing AI from reaching its full potential for cybersecurity. This means creating a roadmap to address key barriers and focusing on use cases that can be scaled most easily and deliver the best return. Only by taking these steps can equipment finance organizations prepare themselves for the rapidly evolving threat of cyberattacks. By doing so, they will save themselves money, and reduce the likelihood of a devastating data breach.

BTPI Survey Findings

Less than half of respondents indicated that their organization was still immature when it came to the use of Agile as a solution delivery framework.

Identifying notable trends has become an annual tradition with the BTPI report. In looking through our data gathered for the survey and industry benchmarks, below we identify a few trends Capgemini has identified that we feel are worthy of a deeper dive. This year we take a closer look at adoption of the Agile framework, a focus on CRM platforms, front and back office system deficiencies and interconnectivity of systems.

Adoption of the Agile Framework

The framework in which IT projects are delivered has been shifting in many IT departments of late. Many organizations are looking to adapt a more agile way of delivering value to the business to be quicker to market. So, how quickly are equipment finance companies looking to such a delivery change? It appears while ambitions are high movement and adoption of Agile principles may be slow. Under ten percent of respondents indicated a mature and efficient use of Agile as a solution delivery framework. This would indicate that the industry may be moving slowly in such a shift. Further signalling the slow move, just under half of respondents indicated that the organization is in fact not using Agile at all presently.

Looking at past year's surveys, the level of organizations that indicated their use of Agile as frequent and already existing as a tool within the company is roughly the same year over year (23% in 2018 and 17% in 2019). Year over year figures show nearly no move in adoption.

Having said that, about 75% of the respondents indicated that this was a near term goal and that they indeed plan to implement some forms of Agile inside three years' time. Therefore, ambitions are high to adopt a new delivery framework shaped by Agile principles but execution and action still low.

Over **60%** of respondents reported that the front and back-end platforms are not integrated to the CRM systems in place.

Focus on CRM

Roughly half of respondents indicated that 360-degree view of customer and CRM was a top near-term initiative for the organization to undertake. This is a noticeable change year over year as just 23% focused on this in 2018. Getting to know one's customer is becoming more and more important as the data becomes more readily available and competitors undertake and leverage such information.

Respondents indicated their lack of efficiency in this space as less than 10% of respondents stated they believe to be optimized in this area. This is a drop from the 30% in 2018 that indicated they were optimized in this field. Why such a drop? One explanation could be as organizations look closely at their different systems it is likely that some are identifying shortcomings in systems once believed to be sufficient or even formerly believed to be outperforming competition. It is also evident that when the CRM system is not integrated seamlessly to front and back office systems, organizations are only now recognizing deficiencies that were always present. Over 60% of respondents reported that the front and back-end systems are not integrated to the CRM systems in place. Interconnectivity of systems is a trend that is moving into the equipment finance landscape and ensuring the CRM capabilities are connected to core platforms could be a differentiator for organizations that optimize in the CRM space first.

Front Office and Back Office Deficiencies

The average ages of both front and back office systems again increased in 2019 among respondents. As age increases so does the likelihood of important functionality being absent based on an organizations current and perceived future need.

The below table details the level of high-level satisfaction in front and back office solutions among responding organizations in 2018 and 2019.

Front & Back Office Satisfaction	2018	2019
Core Back-end system(s) meet current needs	54%	10%
Back-end system(s) meet future needs	23%	0%
Core Front-end system(s) meet current needs	46%	40%
Front-end system(s) meet future needs	46%	10%

Satisfaction

with front and back office systems has

decreased

with respondents in all areas surveyed in 2019 vs 2018.

A decrease in overall satisfaction is seen year over year as systems age. More telling is the fact that the future state vision of companies does not appear feasible in current core platforms. This should point to the potential for system replacements to be undertaken in the near future as functionality is not available within the systems in place.

Integration of Systems

As mentioned above in the section on CRM, the interconnectivity of systems is becoming more necessary and a potential differentiator among firms that do this well and sooner. Below is a table which highlights some of the barriers highlighted by respondents preventing them from delivering on specific customer demands. Note the increases to the major categories of complexity and technology specific obstacles at play. A key question that will need to be addressed as systems are replaced or upgraded is clearly: Can it integrate with the existing architecture of an organization?

Barrier from Delivering	2018	2019
Inability to integrate with current technology	23%	50%
Overall complexity	15%	70%

“... just over **15%** of respondents listed their capability in the integration of systems on the low end of the maturity model.”

In addition, just over 15% of respondents listed their capability in the integration of systems on the low end of the maturity model. This leaves quite a lot of room for growth in connecting existing systems among organizations.

Earlier in this report you read about the Connected Equipment Finance trend emerging in equipment finance. The top challenge to the implementation of such a concept among respondents was the IT incompatibility between legacy systems and fintech systems – further evidence of a need to focus energy and thought into mitigating this risk as IT departments evolve.

Capgemini Point of View

In our 2018/2019 report, we stated that in addition to considering emerging technologies such as RPA and AI in order to gain a competitive advantage, equipment finance companies must also consider a digital, opti-channel, ecosystem model to drive 1) a leading customer experience, 2) a simplified and agile architecture, and 3) reduced operational costs.

In 2019/2020, we believe the need for an ecosystem model and approach stills holds true and in fact, is continuing to become more prevalent within the equipment finance industry. Organizations are no longer just looking to a single core platform to provide a multitude of capabilities, rather they are exploring the combination of “best in class” systems and APIs to provide robust capabilities for their customers.

In addition, whereas the equipment finance industry has historically lagged behind other industries when it comes to technology adoption, we view this gap as narrowing. Embracing new technologies and bringing new approaches to technology are now “top of mind” more than ever before.

BTPI Survey Response Statistics

The following section of the report provides a summary of responses to the 2019/2020 BTPI survey. Since respondents do not always provide information for each question, each table in the survey may have a different number of respondents.

1. What form of organization most closely describes your business?

Type of Organization	% of Respondents
Bank	54%
Captive	8%
Independent, Financial Services	38%

2. What market segment most closely describes your business?

Market Segment	% of Respondents
Micro Ticket	0%
Small Ticket	46%
Mid Ticket	46%
Large Ticket	8%

3. According to the definitions of IT / Operational maturity below, how would you rate your company's capabilities in the following areas:

Initial

Ad-hoc processes. Systems not industry standard and do not cover the entire leasing lifecycle. Widespread use of Excel and stand-alone, nonintegrated systems and tools.

Repeatable

Core processes established, although inefficient. Duplication of data entry prevalent. Core systems integration with supporting systems is non-existent or poorly executed. Front-end and Back-end platforms have limited interface. Reporting is manual and ad-hoc. Organization is dependent on good people, not good processes and systems.

Defined

Processes are documented, standardized and well-integrated with core systems. Some consideration of processes and systems is given prior to new market entry or new program development. Workflow drives processes. Two-way integration between Front-end and Back-end platforms. Partners are linked in through the web for new business origination.

Managed

KPIs and metrics established for processes. Systems and processes drive financial offerings. Web presence extends to partners and customers and covers a wide range of Front-end and Back-end capabilities. Manual data entry is minimized or outsourced, focusing internal resources on analysis and customer serving activities.

Optimizing

Continuous processes improvement. Processes and systems have become a competitive advantage for business. Financial products are highly integrated with processes and systems and some aspects of them are difficult to duplicate by competitors. Customers and markets drive system investments.

Customer Relationship Management (CRM)	
Rating	% of Respondents
Initial	17%
Repeatable	25%
Defined	17%
Managed	33%
Optimizing	8%
Not Applicable	0%

New Business Processing

Rating	% of Respondents
Initial	0%
Repeatable	17%
Defined	58%
Managed	17%
Optimizing	8%
Not Applicable	0%

Back-end Portfolio Servicing

Rating	% of Respondents
Initial	0%
Repeatable	9%
Defined	58%
Managed	33%
Optimizing	0%
Not Applicable	0%

Collections and Customer Service

Rating	% of Respondents
Initial	0%
Repeatable	8%
Defined	58%
Managed	33%
Optimizing	0%
Not Applicable	0%

Customer Self Service	
Rating	% of Respondents
Initial	25%
Repeatable	25%
Defined	42%
Managed	8%
Optimizing	0%
Not Applicable	0%

Customer and Partner Mobile Enablement	
Rating	% of Respondents
Initial	50%
Repeatable	17%
Defined	8%
Managed	8%
Optimizing	0%
Not Applicable	17%

Core Accounting - General Ledger, Accounts Payable, Payroll, etc.	
Rating	% of Respondents
Initial	0%
Repeatable	8%
Defined	42%
Managed	50%
Optimizing	0%
Not Applicable	0%

Business Intelligence/Reporting

Rating	% of Respondents
Initial	0%
Repeatable	49%
Defined	17%
Managed	17%
Optimizing	17%
Not Applicable	0%

Compliance and Controls

Rating	% of Respondents
Initial	8%
Repeatable	8%
Defined	50%
Managed	34%
Optimizing	0%
Not Applicable	0%

Enterprise Risk Management - Liquidity, Operations, Residual Value, Credit, Reputation and Market Risk

Rating	% of Respondents
Initial	8%
Repeatable	25%
Defined	8%
Managed	42%
Optimizing	17%
Not Applicable	0%

Cloud Technology	
Rating	% of Respondents
Initial	9%
Repeatable	36%
Defined	36%
Managed	9%
Optimizing	0%
Not Applicable	9%

Integration of Systems (internal and/or 3rd party)	
Rating	% of Respondents
Initial	17%
Repeatable	25%
Defined	50%
Managed	0%
Optimizing	8%
Not Applicable	0%

Partner Portal Capabilities	
Rating	% of Respondents
Initial	25%
Repeatable	25%
Defined	8%
Managed	17%
Optimizing	8%
Not Applicable	17%

Use of Agile as a Solution Delivery Framework

Rating	% of Respondents
Initial	42%
Repeatable	8%
Defined	25%
Managed	8%
Optimizing	0%
Not Applicable	17%

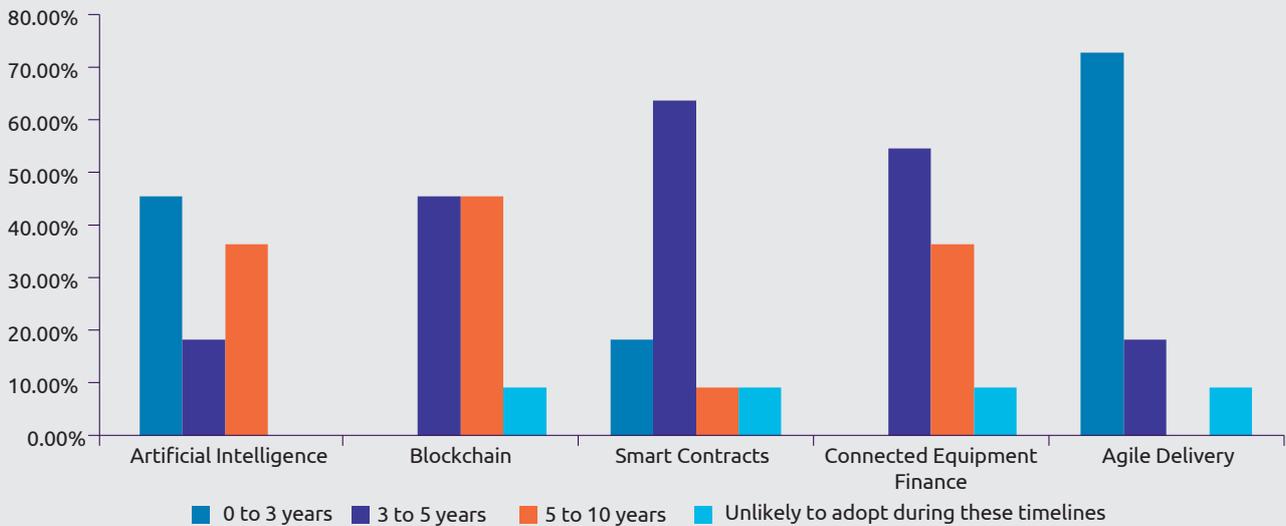
4. Please identify the top 3 key IT related initiatives you will undertake within next 18 months:

Service	% of Respondents
360-degree view of customer / CRM	46%
Back-end (servicing) system replacement	38%
Business intelligence improvements	38%
Front-end (originations) system replacement	31%
Build or improve systems integrations	23%
Buy or build business specific applications	15%
Portal for partners	15%
Use of robotic processing automation	15%
Business Process Management (automation of workflow)	15%
Consolidate multiple Front-end platforms	8%
Consolidate multiple Back-end platforms	8%
Customer self-service (including web, mobile, phone, etc.)	8%
Outsourcing of systems / applications	8%
Implementing the use of Agile delivery framework	8%
Expand financial product offerings	0%
Process efficiency improvement initiative	0%

5. Based on your knowledge and awareness, what is the timeline during which you believe your organization will adopt the following concepts?

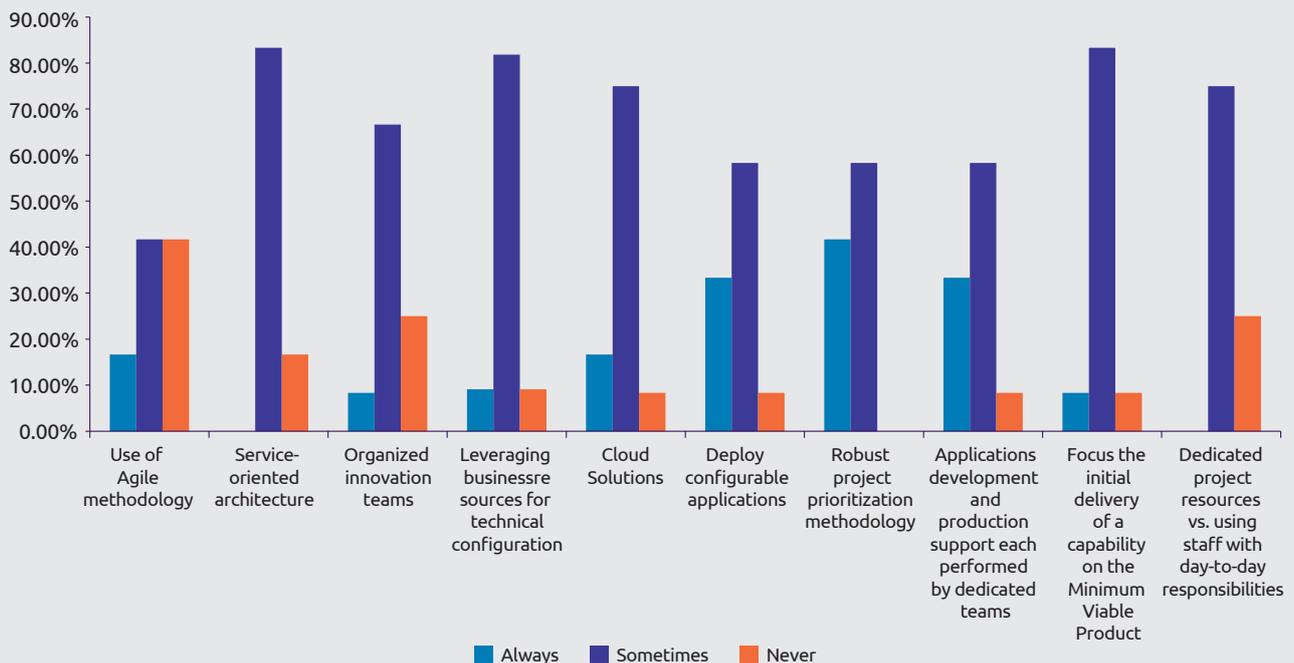
Connected Equipment Finance: An architectural concept which centers around addressing the capabilities needed by equipment finance organizations through an ecosystem of platforms and partners. Many companies are no longer looking for the “silver bullet” E2E solution or single Front-end and Back-end solutions, but rather an ecosystem to provide robust capabilities to drive growth, operational excellence, and customer satisfaction.

Figure 8. Anticipated Adoption Timeline



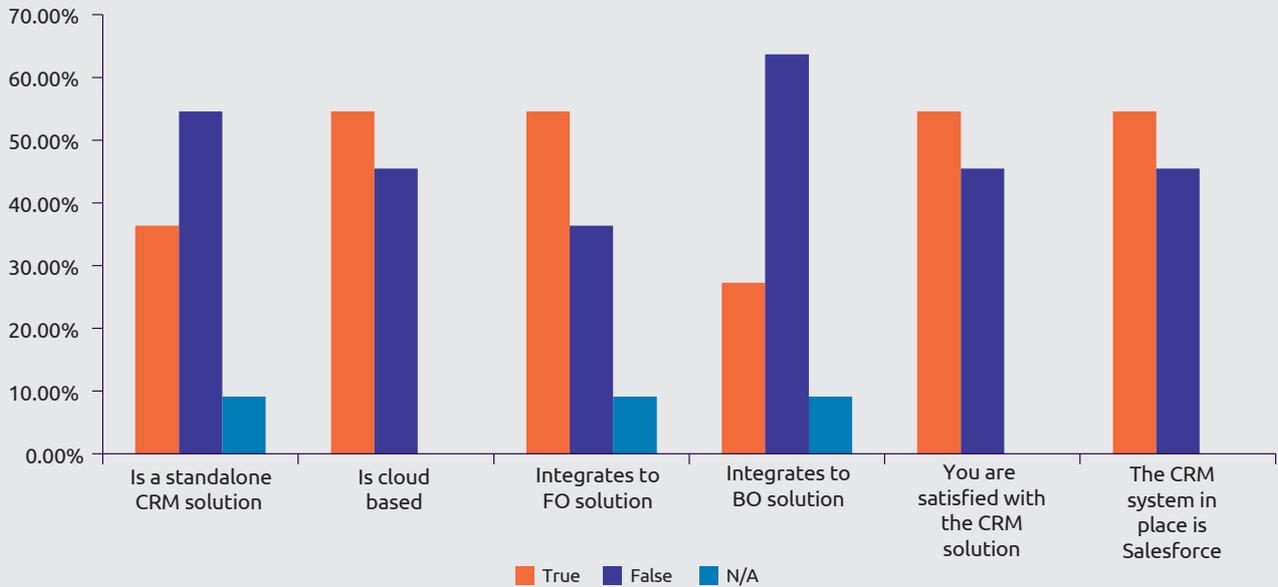
6. Which of the following do you leverage as tools to deliver IT projects and solutions faster in order to reduce time to market?

Figure 9. Tools to deliver IT Projects & Solutions faster in order to reduce time to market



7. Which of the following statements on your organization's CRM system is true?

Figure 10. Which of the following statements on your organization's CRM system is true?



8. For your core **Front-end** originations platform, please provide the following:

Number of years using Front-end system	
Average	7.7 years

9. Please identify the top 3 features missing or most highly deficient in your **Front-end** systems

System application vendor	% of Respondents
Integration to a CRM	64%
Integration to other systems	36%
Mobile capabilities	36%
Cloud capabilities	27%
Data analytics / data management	27%
Workflow capabilities	27%
Integration to back office	27%
Partner or customer portal	27%
System performance	27%
Compliance controls / monitoring	0%
Other	0%

10. For your core **Back-end** servicing platform, please provide the following:

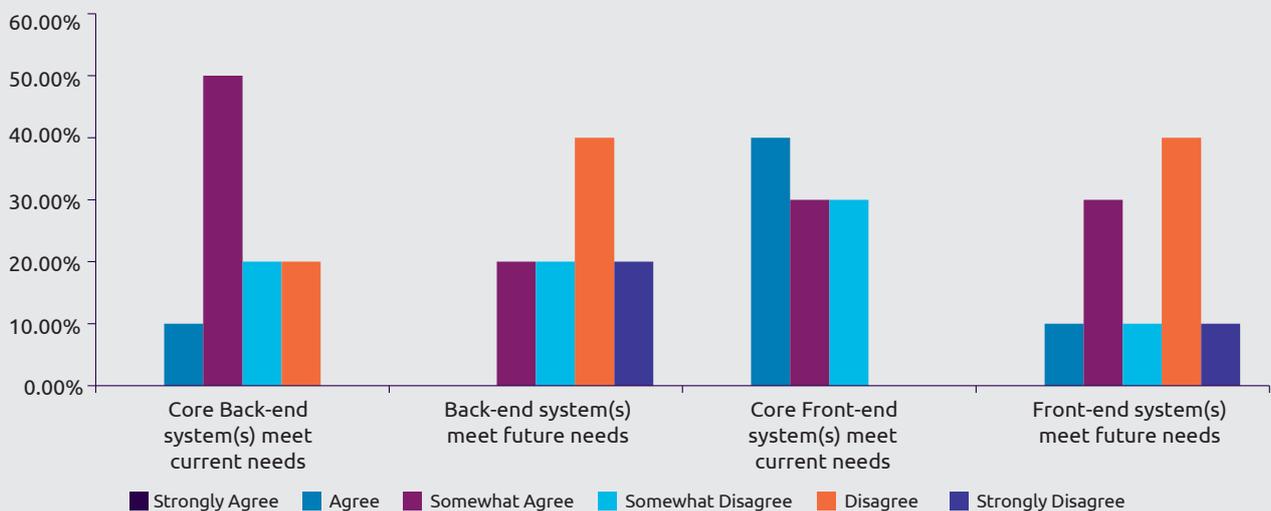
Number of years using Back-end system	
Average	20.2 years

11. Please identify the top 3 features missing or most highly deficient in your **Back-end** systems

System application vendor	% of Respondents
Improved workflow	73%
Data analytics / data management / reporting	55%
Asset management / asset level invoicing	45%
Integration to other systems	45%
Partner / customer portal	45%
GUI Interface	18%
Front office integration	9%
System performance	9%
Cloud capabilities	0%
Mobile capabilities	0%
System documentation	0%
Other	0%

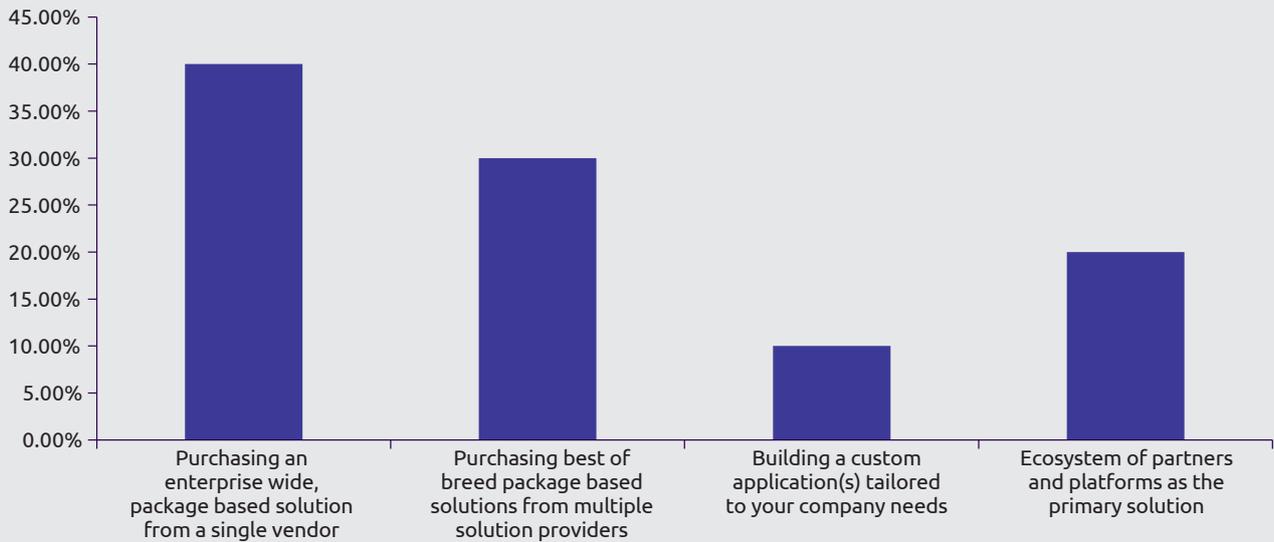
12. Please specify your level of agreement or disagreement with the following statements as they pertain to your organization

Figure 11. Please specify your level of agreement or disagreement with the following statements as they pertain to your organization



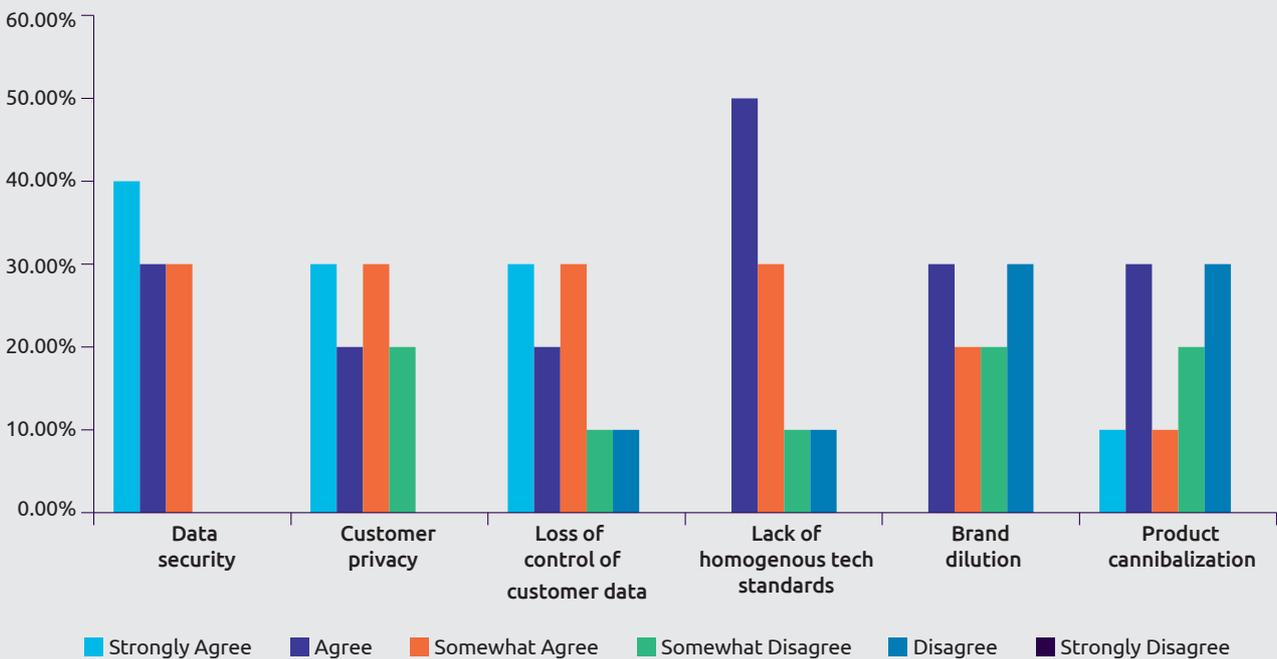
13. For your core, Front-end origination and Back-end servicing system applications, your company preference tends toward:

Figure 12. For your core, Front-end origination and Back-end servicing system applications, your company preference tends toward:



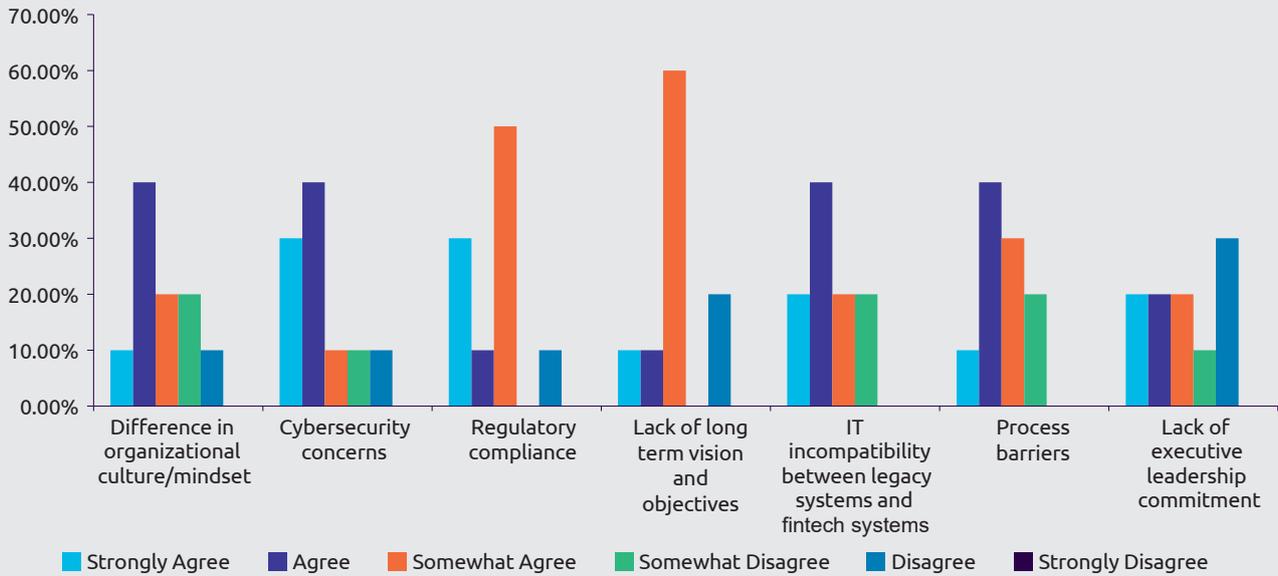
14. **Connected Equipment Finance:** An architectural concept which centers around addressing the capabilities needed by equipment finance organizations through an ecosystem of platforms and partners. Many companies are no longer looking for the “silver bullet” E2E solution or single Front-end and Back-end solutions, but rather an ecosystem to provide robust capabilities to drive growth, operational excellence, and customer satisfaction.

Figure 13. Concerns in Adopting Connected Equipment Finance



15. What challenges do you foresee in implementing Connected Equipment Finance capabilities to your organization?

Figure 14. Challenges in Adopting Connected Equipment Finance

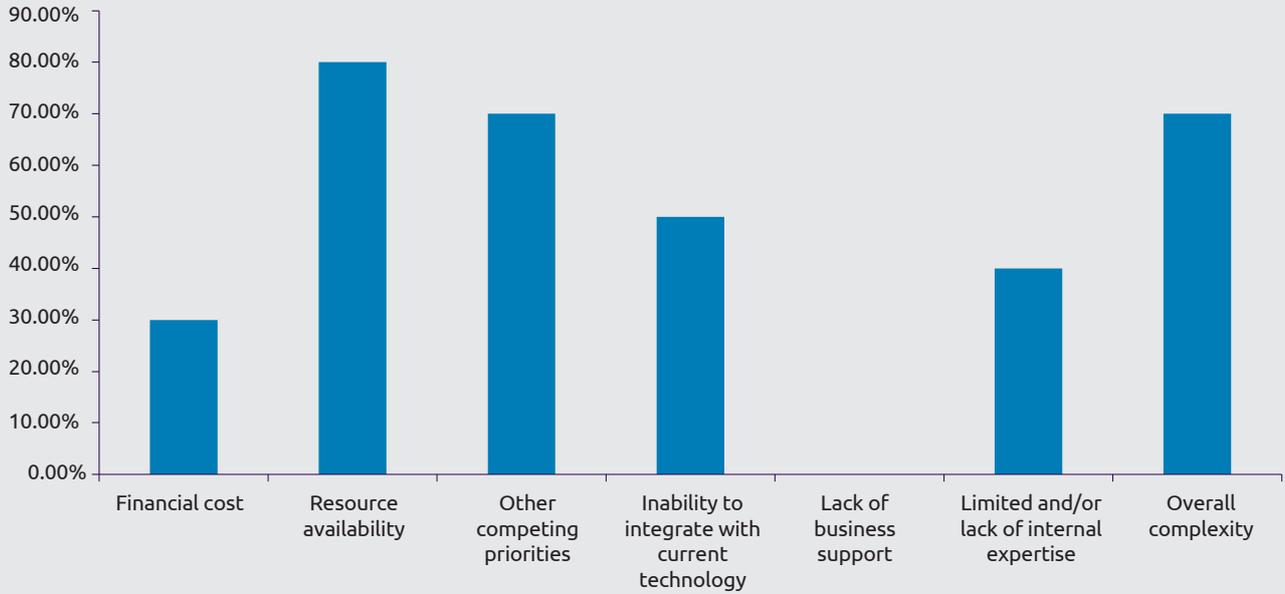


16. What are the top 3 offerings/capabilities that your customers are demanding but you are unable to provide currently?

System application vendor	% of Respondents
Online payment capabilities	60%
Online execution of documents	50%
Support for mobile devices	40%
Ability to obtain buyout quote online	30%
Online credit decisioning	20%
Instant online quote	20%
Online billing statements	20%
Other	20%
Description	20%
Ability to price deals themselves	10%
Customizable reporting formats	10%
Asset level invoicing	10%
Rewards program	10%
Online application submittal	0%
Access to asset management information	0%
Ability to view payment history information	0%

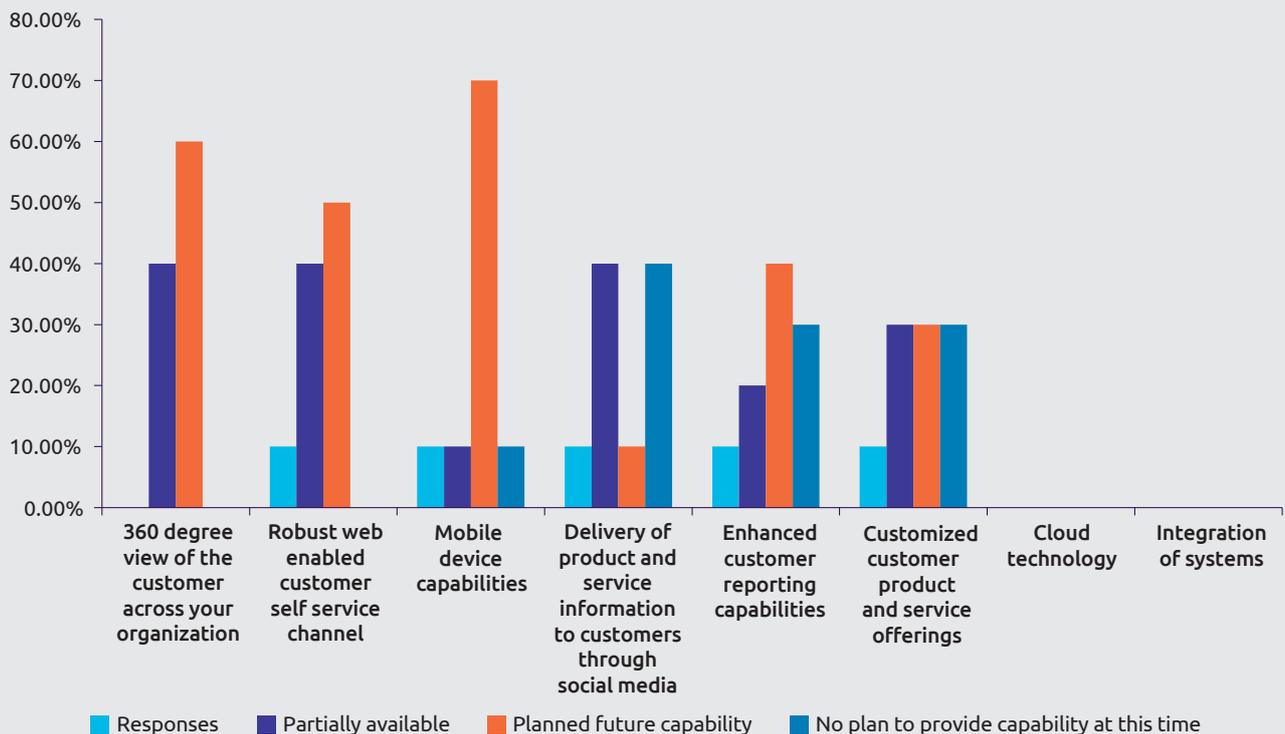
17. What barriers are you encountering in fully providing these offerings to your customers?

Figure 15. Barriers to providing offerings



18. Top organizations in financial services have enabled certain capabilities in order to deliver "Best in Class" service to their customers. Please identify your current delivery capability for each of the following

Figure 16. "Best in Class" Services to their customers



19. Where does your organization fall on the technology adoption life-cycle for the following new technologies?

Market Leader

Companies that have executives that share a strong vision for what new technologies bring, invest in and manage digital technologies quickly and effectively, and gain the most value from digital transformation.

Aggressive

Companies that are very aggressive in adopting new technologies, but do not coordinate well across departments or have an effective vision in place for dealing with the digital business.

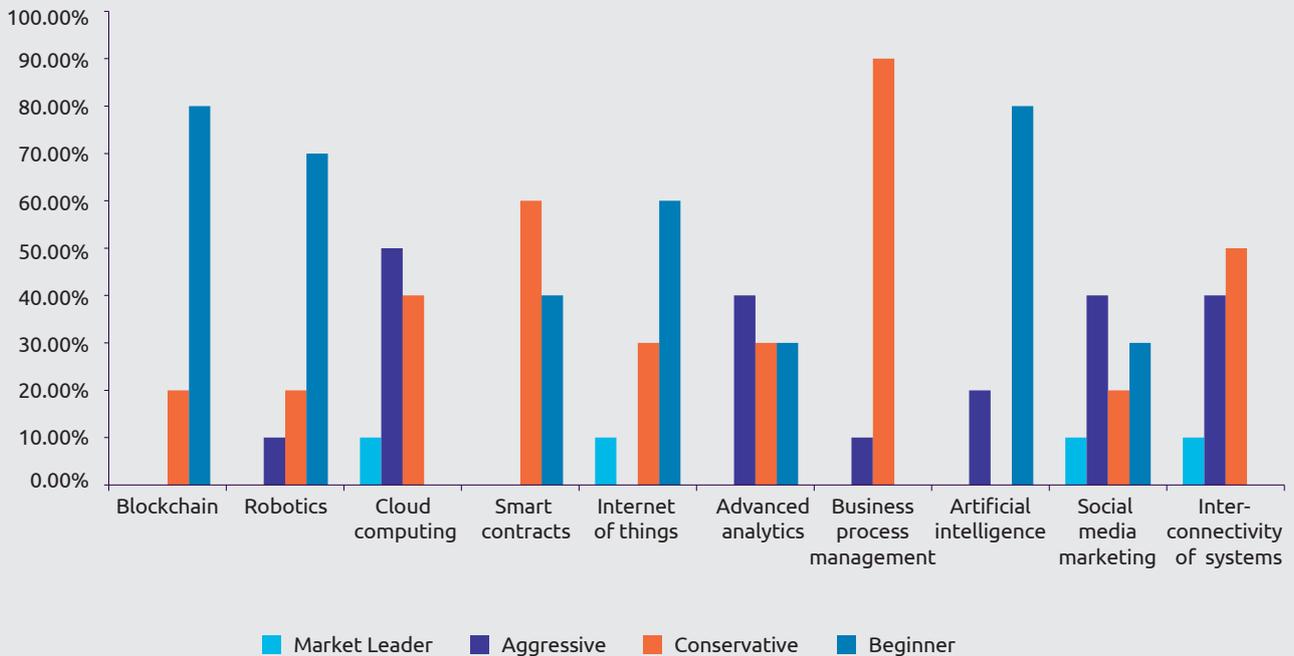
Conservative

Companies that deliberately hang back when it comes to new technologies, although their management has a vision and effective structures in place to govern technology adoption.

Beginner

Companies that have probably used email, internet, and various kinds of enterprise software. But they have been slow to adopt, or are skeptical of, more advanced digital technologies like social media and analytics.

Figure 17. Where does your organization fall on the technology adoption life-cycle for the following new technologies?



About the Report

The 2019/2020 BTPI is the latest report in a series of publications on business trends, systems and technology available through the ELFA, the Equipment Leasing and Finance Foundation (ELFF) and Capgemini. Focusing specifically on trends in technology and operations and the adoption of these trends, the BTPI serves as the equipment finance industry's benchmark for information technology, operations direction, and spending in both areas.

Presented in the report is a summary of BTPI survey responses and a discussion of key findings. Also provided are insights into the continuing evolution of technology in the equipment finance marketplace collected from outside research.

The BTPI was written and compiled by Capgemini from August through October 2019. It is based on industry research and responses representing bank, captive and independent finance companies across a spectrum of ticket sizes, market approaches, and geographies. Most respondent companies are members of the ELFA. Other ELFA resources were also used to support the research, analysis and conclusions found in this report.

Participation in the BTPI is voluntary and free of charge. All equipment finance companies were welcome to participate and were invited to provide survey responses through an online survey. The report will be formally introduced at the 2019 EFLA Annual Convention in October and will be digitally available at: www.capgemini.com/btpi

About the Authors

Authors of the 2019/2020 BTPI are members of Capgemini's Banking and Diversified Financials practice. This group focuses on the equipment leasing and finance market, working daily with companies to help them create more efficient and profitable operations. Capgemini is driven by the conviction that the business value of technology comes from sand through people. It is a multicultural company of over 200,000 team members in more than 40 countries. The Group reported 2018 global revenues of EUR 13.2 billion.

The authors would like to thank all participating companies and Capgemini associates who assisted with this report. They would also like to acknowledge and thank Ralph Petta, Bill Choi, and Amy Vogt of the ELFA for their contributions to this year's report. They were instrumental in ensuring that this effort receives appropriate coverage, exposure and industry participation.



Michael Donnary is a Senior Director in Capgemini's Financial Services Strategic Business Unit, and a leader of the Banking and Diversified Financials practice covering asset, auto, banking and captive finance. From our Chicago office, Michael has major client delivery and industry domain responsibilities for the practice. He has more than 20 years of experience consulting to the asset and captive finance industry. He is a past chair of the Equipment Leasing and Finance Association Operations and Technology Committee, a regular industry speaker, the author of numerous industry articles and holds a degree in Business from Northern Illinois University.



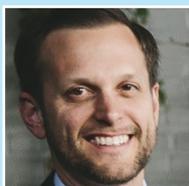
Michael Baez is a Director in Capgemini's Financial Services Strategic Business Unit, and a leader within the Banking and Diversified Financials practice. Michael is a subject matter specialist in equipment finance. For over 35 years, he has worked extensively in the financial services industry with global experience in equipment finance, credit risk, corporate treasury, cash and wealth management, process and risk management, operations and technology. He received both his undergraduate and post-graduate education at Long Island University. Michael has served as the Capgemini liaison to the ELFA since 2014. Michael also serves on the ELFA Technology Innovation Working Group and has recently been appointed to the ELFA Equality Steering Committee.



Theresa Eichten is a Senior Delivery Manager in Cappgemini's Financial Services Strategic Business Unit, and a Senior Business Systems Analyst with 20 years of experience across the US, APAC and EMEA markets. She has extensive experience with financial software products within the leasing and asset finance industry, specializing in lease / loan origination workflow and back office portfolio management systems. Theresa is a Certified Scrum Master and PMP. She has a BA in Business Administration from the University of Minnesota



Annette Maxwell is a Delivery Program Manager in Cappgemini's Financial Services Strategic Business Unit, and a subject matter expert in the Core Banking, Originations processes. She has over 15 years of experience in the financial industry delivering complex projects and systems in both the core banking and diversified finance domain. She also has extensive experience in program management and project delivery for global projects. She received her undergraduate degree from Simon Fraser University in Canada.



Bryan Parfitt is a Senior Delivery Manager in Cappgemini's Financial Services Strategic Business Unit, and subject matter specialist in complex business analysis in diversified finance, technology platforms, and credit risk. For the past 14 years with Cappgemini, he has been a part of many diverse projects within the financial services industry offering consulting services and project management on implementations (front and back office), process redesign, mergers and acquisitions and system selection among many other projects both domestic and abroad. Bryan is a Certified Scrum Master, Certified Scrum Product Owner I and AWS Cloud Practitioner. He has a BA in Business Administration and Political Science from the University of Florida.



Kyle Johnson is Senior Manager at Cappgemini in the Banking and Diversified Financials Practice for over 12 years with experience in a diverse set of industries including leasing and lending, technology, banking, and capital markets, in which he focuses primarily on System Development Lifecycle, System Selection, Finance Transformation, Project Management, and Process Improvement/Re-engineering. He received his undergrad at Miami University

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