

Point of Sale: the heart of retailing



Why this report?

Capgemini has a long history with retail and digital transformation, and has developed deep capabilities in both, including expertise through numerous projects related to a crucial part of the retail business - the Point of Sale. Whether it is called Point of Sale, Point of Service, Point of Contact or some similar name that encompasses both online and offline purchases, it will always end in a financial transaction, and regardless of the name, the interaction with the customer is what ultimately matters most.

The market for Point of Sale (PoS) solutions has changed dramatically over the last couple of years. Acquisitions, Omni-channel strategy, demand for a lower Total Cost of Ownership (TCO), introduction of Cloud-based PoS solutions and the request for real time analytics capabilities has transformed the industry. As a result, retailers are getting more and more confused about the route to take with respect to selecting a new PoS solution. Just taking the most recent "Forrester Wave™: Point Of Service" report or Gartner Magic Quadrant can provide a starting point with some insight on leading PoS vendors, but does this list identify the solution that fully meets your requirements? Because of the lack of both time and resources, retailers tend to move forward with PoS vendors provided by Forrester and/or Gartner. Even then, comparing solutions against retailer requirements remains a time-consuming task. Since most retailers perform an evaluation

of their PoS solution only once every 10 to 15 years, there is limited knowledge and experience available to complete the evaluation internally.

Intel positioned the following market trends as influencing the need for innovative POS solutions: New store experience-focused capabilities in an era of omni-channel commerce, and customer demand for frictionless experiences, including self-service and contact-less payment.

To provide retailers with expertise and best-in-class insights, Capgemini uses a proven approach and PoS tool that serves as an accelerator to the evaluation process. More than ten years ago, Capgemini started collecting data about PoS solutions. Initially a local initiative with just a few global PoS vendors, over the years Capgemini expanded this initiative and incorporated all global and select regional vendors. An extensive and detailed questionnaire is sent twice a year to the market, and all acquired data is added to our PoS tool as a part of Capgemini's standardized PoS evaluation process.

In the following sections, we will take a look back in time, share insights from our PoS tool, and examine future trends.

Retail industry consolidations, omni-channel strategies, demand for lower Total Cost of Ownership (TCO), Cloud-based PoS solutions, and the request for real time analytics capabilities have transformed the industry.



Fast forwarding to today's retail environment new technology has massively changed the look and feel, as well as the usability of registers.

PoS: where did it start and where does it stop?

PoS has a long history. The concept as we currently know it has existed since 1879 and was initially used for register purposes and to secure money. Safes and locked cash drawers offered protection against intruders and fraud.

For decades, the role of a register didn't change much. It was only in the last 25 years, with the arrival of the Internet, that PoS became capable of doing much more than just registering transactions and keeping revenue secure. Now PoS has become a tool positioned at the heart of retailing and connects to all downstream and side stream systems. PoS is occasionally referred to as Point of Service as it is located in a store where the store associate completes the service for the customer and finalizes the interaction by completing the transaction.

Fast forwarding to today's retail environment, new technology has massively changed the look and feel, as well as the usability, of registers. Where the customer was comfortable with a fixed point in the store where transactions were completed, they now can be served in any part of the store using mobile technology.

Looking back in history, we can still see that the essence of PoS hasn't changed. However, the "Internet of Things" now delivers, and continues to expand, capabilities that address the growing need for real time data across PoS transactional information to help deliver actionable insights on the spot as conditions change. While predicting the future is still only for the paranormically gifted, a quick, targeted and personal PoS response to changing market conditions will translate to more happy customers.

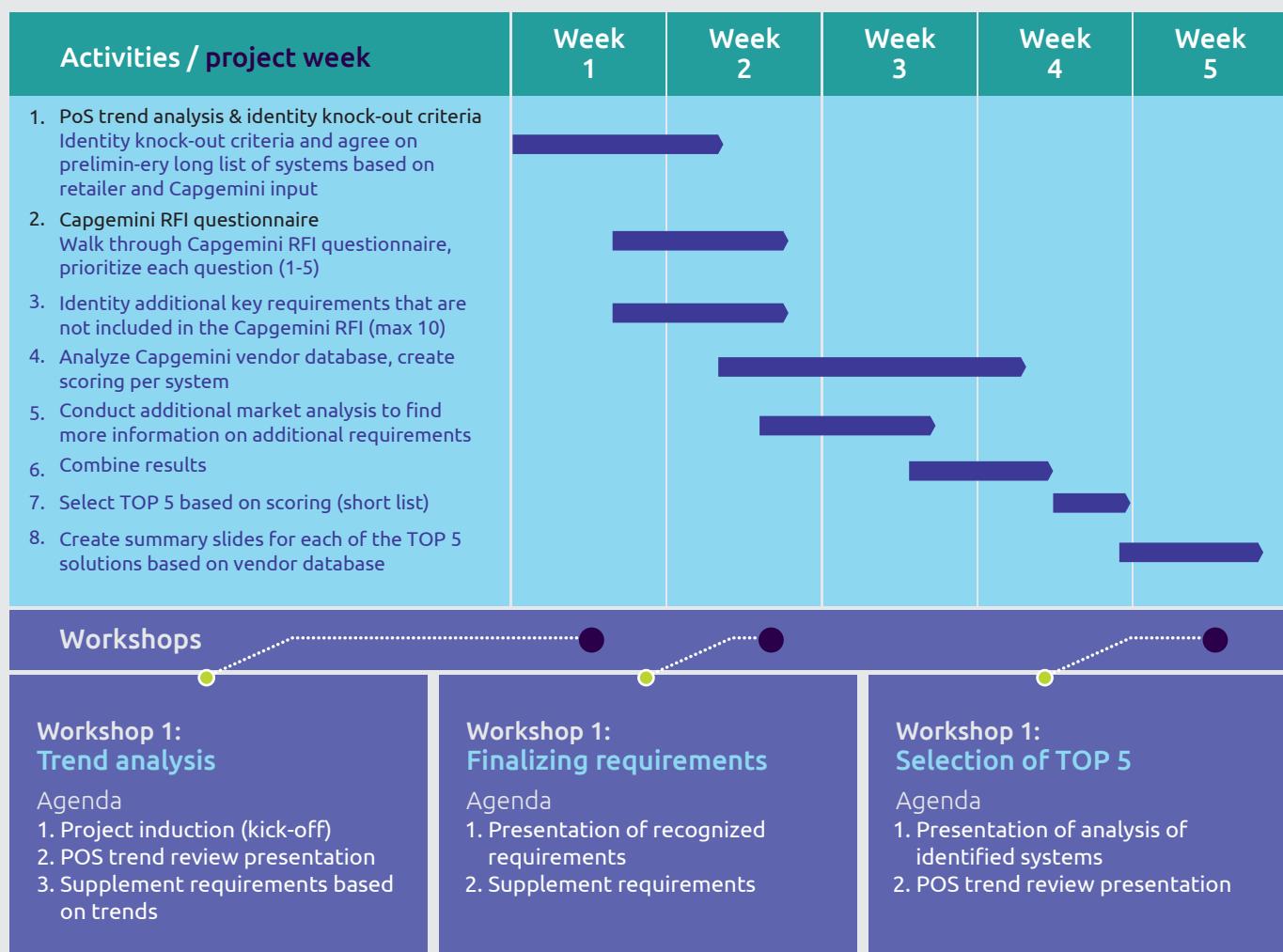
Capgemini PoS evaluation process

To support retailers in their evaluation process, Capgemini has developed an industrialized process. A crucial part of this process is the Capgemini PoS tool.

The biggest benefit of our process and approach is the availability of detailed information about the world's leading PoS solutions. The combination of this information, along with our extensive

experience in PoS evaluation processes and key requirements documentation, makes it possible to provide a ranked shortlist in just five weeks. In this timeframe, there's even time to add additional PoS solutions from the local market if requested by the retailer.

Figure 1: Capgemini PoS evaluation process – shortlist definition



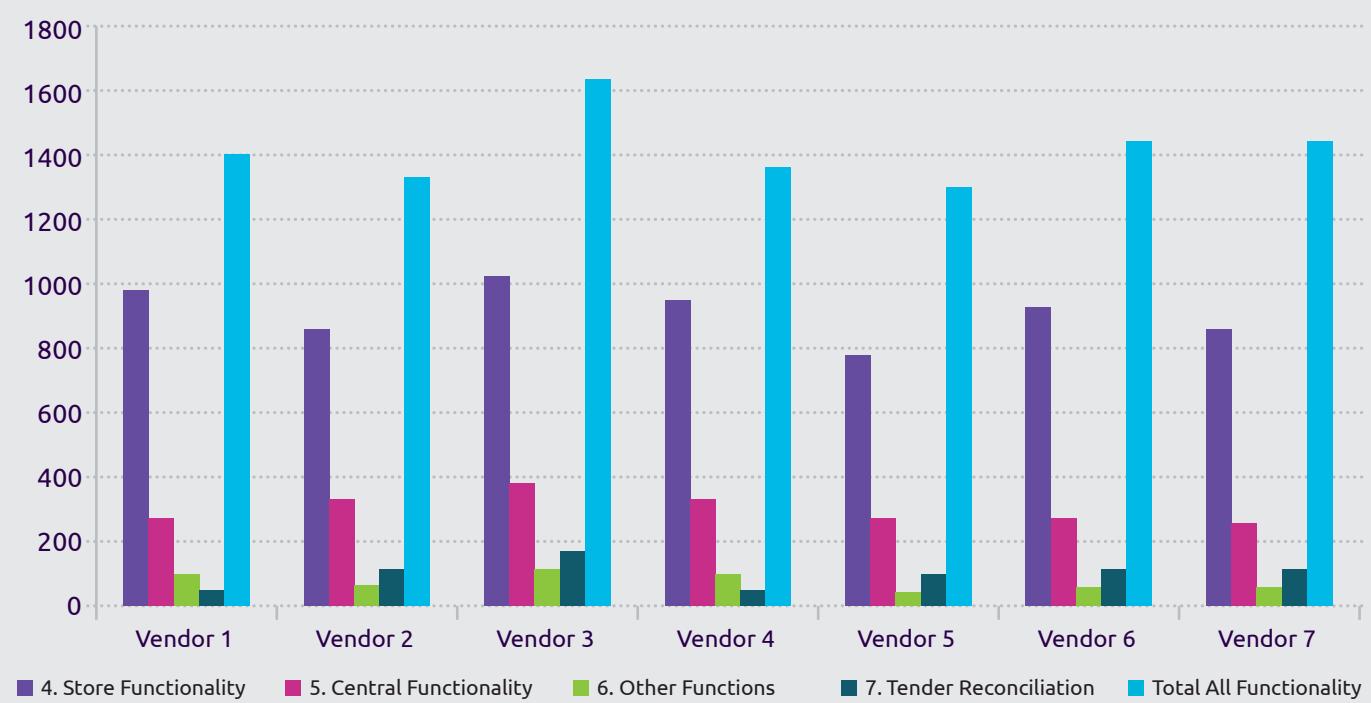
Approach and deliverables

The first part of the evaluation process focuses on functionality. Using a combination of more than 250 questions and priorities set by the retailer, we provide a weighted list showing the score per vendor. Since we have received detailed information from targeted vendors based on questionnaire responses, we can compare the solutions from these vendors against functional areas like tender, discounts, promotions, security, and financial management in our PoS tool. Below, please find an example based on an evaluation process for a major retailer. This

graph not only shows the results but also the flexibility of our PoS tool. Based on requirements from this retailer we have customized and added "Tender Reconciliation," the process of reconciling disparate transactions, as a separate area to evaluate.

In addition to ranking functionality solutions, the tool provides information for comparing architecture, references, and omni-channel capabilities. We provide a transparent process that best helps determine a desired shortlist and gives retailers added confidence in their decisions. This shortlist then becomes the basis for a Request for Proposal (RFP) process.

Figure 2: Results for 4 different functional areas and the overall scoring



Vendor trends and differences

There are many different vendors with many different solutions that target customer and market needs. But what are the differentiators and which vendor will suit the client's requirements best? For example, are there unique elements in offering an omni-channel solution and what are the common threads between vendors? This section provides a unique insight into the Capgemini PoS tool, its wealth of information, and an analysis on some key aspects from almost 20 different PoS vendors.

Globalization

Given the mature state and slow growth of domestic retailer markets, global expansion has become one of the hottest growth strategies. In other countries you'll find that retailers believe international expansion is one of the main drivers to staying in business. Gaining access to new customers and growing markets will boost sales and volumes that strengthen a company's purchasing power via programmatic promotions and access to larger volume discounts.

50% of the vendors included in the Capgemini PoS tool currently have a clear global presence.

Global presence demands a worldwide operating organizational structure and associated connecting processes and IT solutions. If the target market doesn't differ much from existing markets, it can be a good choice to deploy a single, multilingual ready, PoS solution

offered by a vendor with similar international views.

What defines a vendor as a true international player is an interesting discussion. It inevitably starts with a clear international focus to grow along with their clients or prospects. The ones without a global presence are expanding their business within (parts of) Europe and/or working on an internationally deployable system. As their customer base globalizes, globalization quickly becomes a hot topic for PoS vendors.

We notice that international retailers are struggling with the question "Should I deploy one single solution across the globe?" and "Can I use a single template for my global business?" It's clear that international retailers looking to the future prefer to have a single solution to support their business but are also reserved because of local differences

Leading innovation

In response to the changing retail market, quickly adapting to new trends and opportunities is getting more and more critical for retailers. Creating a smart retail environment that offers a seamless customer experience is becoming key for most businesses. A PoS solution must not only adapt to the new trends in retail but can also be a real change driver. Offering a mobile PoS and self-service checkout is no longer a unique differentiator. To be the leader in the sector, continuous innovation is required where store automation is an important element. The PoS solution is considered the heart of operations and is seen as a single point of information by both store

employees and customers. Some of the trends we spot in our PoS tool are related to actionable real-time data insights, customer loyalty integration, omni-channel solutions and offering solutions based on cloud technology.

40% of the analyzed vendors already offer a solution based on cloud technology

Implementation

A new PoS implementation can have significant impact on the business. Business processes should be evaluated to determine if they need to adapt to a new business model or the PoS solution should be tailored to the existing business model, or a combination of both. This contradicts the trend of staying with minimal changes using out of the box systems. Regardless, the implementation may be complex and should not be underestimated. Most of the reviewed vendors offer end-to-end support services during the roll-out phase and accompany the roll-out with their expertise and experience. Others rely on the customer's capabilities, with or without external resources from an experienced system integrator. The lead time is another important consideration regarding the roll-out of the new solution. Adapting to the business needs and the chosen vendor, the roll-out period can vary from 4 to 12 months. Capgemini offers over 20 years of implementation experience and often serves as integration partner on behalf of retailers or vendors using our standardized multi-phased approach.

The roll-out period can vary from 4 to 12 months

Capabilities and vendor maturity should also be taken into consideration when kicking off a PoS evaluation. Today for example, the number of vendors that can provide a PoS Cloud solution is very limited. On the other hand, "Are retailers ready to run their PoS from the cloud?" The answer will differ per type of retailer, location, connectivity, and solution design.

Version control

Upgrades for the PoS solution are essential to keep up with business and consumer needs. Can your company take advantage of innovations made for other customers by bringing these into the commonly used core version or are you developing your own solution totally separate from the others? All vendors integrate software using a standard release customized through variable parameters.

Furthermore, PoS vendor upgrade lead time and frequency can hinder solution development and can cause inflexibility. Capgemini, therefore, strongly believes in a model with a limited number of versions throughout a roll-out program while maintaining optimal flexibility and striving towards standardization.

For all vendors, the software is integrated using a standard release customization.

Support

Support for store automation (e.g. PoS) can be organized in different ways. As automation begins to impact second and third line support, it's crucial to have access to the right system knowledge either in-house or using third-party

specialized service companies. 90% of PoS vendors included in the PoS tool offer first, second and third lines of support. Very few PoS vendors outsource their first line support to third parties.

Furthermore, it's essential to manage the support on your peripherals in-house (e.g. EFT terminals and scanners). From a store employee point of view, it's recommended to have a single point of contact organization for all PoS related questions or issues. As part of support, retailers look more and more to decrease support costs by enabling remote management.

90% of the vendors do include in-house 1st line support

Optimizing remote management is not only a software matter; it also depends on hardware capabilities.

Future of Point of Sale (PoS)

Although the world is changing quickly, the changes in retail and more specifically around PoS systems are less volatile. The main purpose of checkout has hardly changed over the last century. At the start of the 20th century, prices of goods were captured and the total amount was calculated and paid. The purpose is virtually the same today. However, the technology used for capturing transactions and making payments has changed over time and will continue to change in coming years. In the end, it's all about "what has been sold?" and "when is it sold?" and "to who is it sold?" and "against what price is it sold?"

Of course, this is a very simplistic way of looking at PoS system. In addition to its basic function and

as a consequence of omni-channel, a modern PoS should support full integration with all downstream and side stream systems in order to meet today's and tomorrow's customer demands such as "never disappoint," "no more waiting lines," and "easy shopping and simple checkout."

Today's example of a presumably futuristic store is Amazon Go. The so called "Just Walk Out Shopping Experience" allows customers to collect all their products and just walk out of the store when they are done. The Amazon Go app keeps track of all the products in the shopping basket and automatically charges the customer's Amazon account after he or she leaves the store. It's an interesting test case to take away one of the biggest frustrations of the consumer. The technology is available, either using RFID or a combination of computer vision, sensor fusion, and deep learning like Amazon Go, and really depends on type of business, costs, security, and seeing market acceptance of the concept. Later, expect to see new innovations like blockchain technology become more prevalent in transaction tracking.

Capgemini sees PoS as the beating heart of the store, both online and offline. Therefore, PoS plays a crucial part in the Capgemini / Intel initiative "Smart Digital Store." The Smart Digital Store enhances the physical store with digital capabilities to empower associates, engage customers, increase operational efficiency, and generate more revenue.

See also:

<https://www.capgemini.com/smardigitalstore>

About the Authors

Martin van Vugt

Principal Consultant
Consumer Products & Retail Capgemini
martin.van.vugt@capgemini.com

Martin is the global PoS lead of Capgemini's Consumer Products, Retail, Distribution segment. He has a long and deep experience in retail consulting with food and non-food retailers in the Netherlands and Internationally.

Jen Dolan

Managing Consultant, Business Transformation Services
Retail Store Operations
jen.dolan@capgemini.com

Jen is a managing consultant in the Retail Operations capability of Capgemini USA. She has over 30 years of experience in Retail and Consulting with primary focus on POS selection and implementation for all retail formats in both the US and Canada.

Ron Peek

Senior Consultant
Consumer Products & Retail Capgemini
ron.peek@capgemini.com

Ron is a senior consultant in the Retail Operations capability of Capgemini Netherlands. He has extensive experience in Retail Operations, Store Innovation and PoS development.

About Capgemini

A global leader in consulting, technology services and digital transformation, Capgemini is at the forefront of innovation to address the entire breadth of clients' opportunities in the evolving world of cloud, digital and platforms. Building on its strong 50-year heritage and deep industry-specific expertise, Capgemini enables organizations to realize their business ambitions through an array of services from strategy to operations. Capgemini is driven by the conviction that the business value of technology comes from and through people. It is a multicultural company of 200,000 team members in over 40 countries. The Group reported 2017 global revenues of EUR 12.8 billion.

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