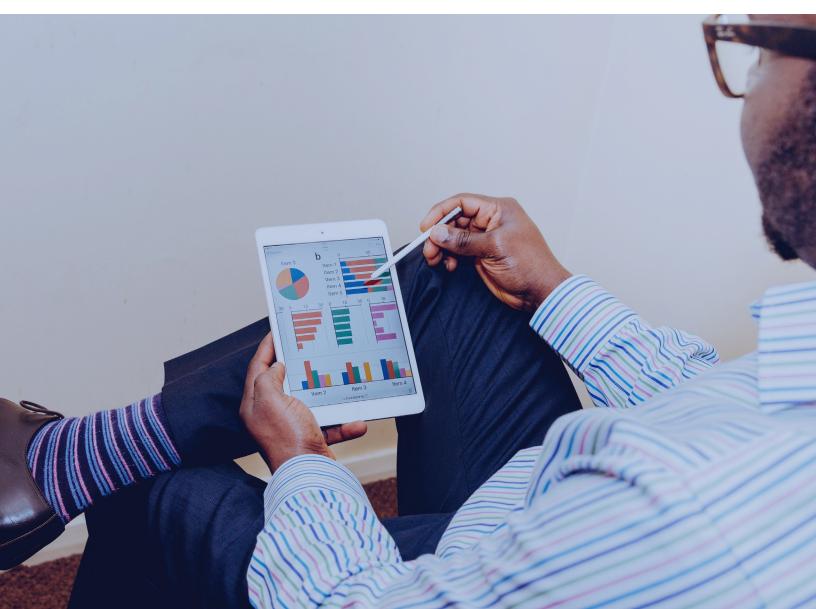emStream

How Data and AI can Redefine Procurement

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Since the outbreak of the global pandemic, most organisations are faced with overwhelming operational challenges and an increased level of uncertainty. This situation is most likely here to stay for the foreseeable future. Lockdowns and the extensive use of digital connectivity tools were the most visible consequences. While economic impact varies across industries, the pandemic created a sense of urgency to adopt new business models and accelerate digital ambitions.

From a procurement perspective, the pandemic immediately called for a more intensive leverage of the function's natural competencies: ensuring operational continuity and mitigating financial, operational and contractual risks. Organisations impacted more heavily by the disruption, additionally needed to decrease their cost base drastically by delaying, renegotiating or terminating spend. This was true crisis management and often led to quite painful experiences for all involved. It also showed the value of a mature procurement operation.

Procurement had a key role to play in accelerating the purchase of digital connectivity solutions. With employees confined at home, organisations demanded touchless, presence-less and paperless solutions immediately. Driving this new digital journey required sourcing expertise and access to technology vendor networks providing business value far beyond the traditional contracting and cost saving mandate.

What about procurement's own digital journey?

While procurement groups largely met expectations to engage and leverage value from the external market, not all organisations performed equally during the crisis. It was obvious that more mature procurement organisations with skills, expertise, set processes and the technology (i.e. supporting e-tools), were in a much better position to quickly assess risks and become valuable business partners. While procurement professionals were orchestrating new digital ambitions for the organisation, it became quite evident that technology presents a great opportunity for digital transformation of the procurement function itself.

Digital procurement in many respects means greater use of data analytics and automation to improve the core sourcing processes (P2C and P2P) and provide greater analytical insights on vendor management. For example, within the Source to Procure (S2P) process, access to previously unavailable data, better real-time analytics, agile e-sourcing tools and timely alerts, all lead to improved accuracy of decision making. Furthermore, the mostly transactional procure to pay (P2P) process can now be completely automated and robotized thereby freeing up scarce competencies for more value-add activities. Finally, supplier management, a function so often vilified by the "watermelon analogy" (status green on the outside, red on the inside) can now be based on real-time aggregated and visualized data. This is the opportunity for a single point of truth, pre-emptive collaboration and improved service levels.

The technology gap in procurement

While the digital agenda specific to procurement is widely accepted as necessary, most companies are slightly weary of expensive technology programs. Past Investments in core sourcing applications leave many organisations with the feeling that much has been done with too little results. An illustration of this is the wide implementation of Contract Management, e-Sourcing and Spend Management modules. While these are usually implemented with the objective to improve effectiveness and productivity, the necessary integration with existing legacy systems often increased complexity drastically and lead to business stakeholders feeling exasperated.

Another barrier to new initiatives is the low level of systems usage. When taking a closer look at core procurement applications, we must admit that user adoption often remains low while operating costs increase continuously. This leads to the perception that contract management systems are just used as expensive contract repositories. Similarly, spend management modules are solely based on crippled information from accounting systems and e-sourcing application are hardly used due to their unfriendly user-interfaces. We are therefore far behind expectations.

Moving forward with digital technologies

New technologies can often be implemented in smaller initiatives and offer greater value for users and business leaders. The momentum created by the pandemic offers procurement leaders an opportunity to reassess their technology roadmaps and align their digital ambitions with today's expectations. Here are a few cases that illustrate how innovative technologies can contribute to improved efficiency in specific procurement areas.

■ Spend categorisation – Spend data is readily available, abundant but traditionally messy to analyse. New data-driven solutions use Pattern Recognition combined with machine learning to quickly categorize unstructured spend. Feeding context enriched data into advanced predictive analytic models creates meaningful business insights while avoiding the extensive effort related to the implementation of strict company-wide rules and processes.

■ Data enhanced supplier dashboards - Data captured from sensors monitoring the movement of goods or the performance of equipment feeds instantly into a supplier performance dashboard. This enables the identification of trends and more importantly the opportunity to handle potential risks early.

■ OCR enabled contract management - Optical Character Recognition (OCR) combined with learning algorithms can be used to scan mass documents such as contracts, order forms and technical descriptions. It further allows systematic extraction of key information such as unit prices, termination clauses and service levels. This is a process that usually requires days or weeks.

■ Machine learning enabled competency portals – The onboarding of new contractors is often a time consuming and expensive process. ML enhanced Marketplace portals for freelancers use algorithms to match skills with roles and instantly deliver shortlists of vetted candidates. These solutions bypass the traditional MSP/VMS offerings, provide lasting benefits and have the added advantage of attracting top-tier talents with minimal fees.

Data initiatives in general offer the greatest potential for value-add. There are endless examples where innovative technologies are used to enable access to previously unavailable datasets. The new tools perform more complex analyses, create more efficient operations and therefore lead to closer alignment with the current business context.

Looking beyond "old dogs, new tricks": new technologies, new vendors

New initiatives require a new technology vendor ecosystem. For historical reasons, the procurement marketplace is still dominated by large suite vendors that continuously extend their scope by offering integrated solutions encompassing all procurement needs. While these solutions remain attractive, new specialised vendors have entered the market and generally provide greater innovations. They tend to be SaaS natives, offer a much better User Experience (UX) and provide cost optimised lean implementations.

Expertise in AI/ML powered advanced analytics is a key reason for exploring new vendors. These next generation vendor platforms usually deliver efficiency and deep insights through AI powered technologies. This has the advantage of enhancing the value of existing legacy systems while new investments and integration efforts remain minimal.

Niche vendors focused on new technology stacks naturally offer the benefits of digital transformation. The solutions are generally easier to use, based on cloud technologies and designed around microservices and APIs, and usually adhere to the mobile-first principle. This new architecture accelerates the deployment of best-of-breed solutions and evens out the playing field with the integrated modules of the large suite vendors.

How to step forward – recommendations towards embracing change

The vendor and solution ecosystem – There is no one-size-fits-all solution to building a technology partner ecosystem that fosters innovation and delivers the required outcomes. Companies have different maturity levels and requirements.

For those organisations that have traditionally under-invested in IT, the current context presents a true opportunity to leap towards web-based solutions free from the burden of complex legacy systems. For more mature organisation, the new technology stack allows for an extension of current capabilities through specific additions on data analytics or user experience. Our key recommendations are:

An agile approach: It is widely recommended to adopt an agile approach when introducing new technologies. While no longer a secret, it is well worth reiterating the benefits. The focus on short and iterative sprints with early stakeholder involvement usually drives much better technology adoption and improves the chances of success of the initiatives.

Building transformation competencies: Digital initiatives in procurement also require sufficient internal transformation management capacity. This is the key ingredient that leads to changing attitudes, leaner processes and even the creation of new roles. In an agile-first digital world, rigid and cumbersome RFx processes are not the answer anymore. Even in procurement there is a growing need for data scientists.

Old-fashioned procurement best practices still apply: This new digital era requires procurement teams to continuously challenge historically well-established vendors and create the grounds for a vibrant competition with innovative newcomers. It also requires an open-minded approach to new relationships and business models. Concepts such as the sharing economy, open communities and global customer data platforms can hold opportunities for significant value creation that cannot be overlooked.

While the difficult task of building a digital roadmap in a fast-moving context remains, procurement leaders have an increasing number of great options to move forward. The worldwide pandemic might have helped to put focus on Digital, but procurement teams must also accept and ready themselves for these new challenges. Those who choose to embrace change, will considerably increase their understanding of risks and opportunities associated with new technologies; They will thereby secure their position as strategic business professionals for the foreseeable future.

Most definitely, these are interesting times for procurement professionals.

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