Contract Management Innovation in Public Procurement: Costa Rica's Experience

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The Traditional Model

Costa Rica is an upper middle-income developing country, located in Central America; it has a population of approximately 5 million inhabitants and its national GDP amounts to US\$ 45.13 billion. Accounting for roughly 20 % of the Costa Rican national GDP, government procurement plays a very important role in ensuring effective and transparent management of public resources. According to a poll by the University of Costa Rica (UCR), public contracting has been identified as one of the government's activity having the highest perception of bribery risk (Poltronieri 2011, p. 3). This is a worldwide phenomenon. In a Public Expenditure and Financial Accountability Program Assessment (IDC-WB 2010) held in October 2010, the procurement model presented weaknesses due to its highly fragmented model, and lack of control facilitation or efficiency within the procedures. In this same assessment, Costa Rica's transparency in procurement ranked as low as D+. Transparency in government procurement, together with citizen's active involvement as government's expenditure auditors, constituted a critical need in Costa Rica.

To conduct a functional and practical analysis of the current Costa Rican public procurement model, the starting point of the case to be described in this chapter must

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be clear: The traditional procurement model in Costa Rica, governed by red-tape and paper, was exhausted. The new innovated model based on an online procurement service must cover the whole cycle, from planning to contract management.

Starting Point and Scenario

According to World Bank's experts (IDC-WB 2009, pp. 163–164) who analyzed the country's public expenditure environment, Costa Rica's legal and institutional framework for procurement is based on best international practices. However, the country's procurement followed a fragmented model and had a series of deficiencies. The assessment stated that the public sector failed "to take full advantage of available procedures, practices and management tools." Some examples of how the model was failing to support Costa Rican efficient budget execution may be summarized through the existence of excessive amounts of paperwork, bureaucracy, and poorly integrated processes. These are some features that characterized this traditional model:

- No standardization of procurement documents and processes
- Lack to enable price-referencing, benchmarking mechanisms, or supply industry analysis, due to the use of different codifications (goods and services classification codes) and not-integrated supplier registration database
- Different procurement proceedings in each entity lack international standards such as product codification, forms, terms of reference, business documents, and transactions as a result of fanciful interpretations or ignorance of the applicable regulations
- Numerous regulations and procedure manuals, depending on each entity
- Numerous investments and disintegrated use of IT platforms
- Duplication of requirements and procedures for supplier registration through different institutions
- Purchasing processes that require multiple approvals and reviews at different levels (individuals and committees)
- Lack of process reengineering, standardization, and simplification, due to excessive requirements that must be met depending on the institution

After analyzing the country's reality, Inter American Development Bank (IDB) and World Bank (WB)[3] issued a series of recommendations, which pointed out that the country should focus on seeking greater efficiency and savings through procurement rather than implementation of the existing legislation. The recommendations stated that the country be urged to implement mechanisms to enable advanced procurement instruments, already available in the legal framework (reverse auction, joint contracting agreements, denominated "convenios marco"). The assessment estimated potential savings (between 12.6 and 17.6 %) and urged the Ministry of Finance to take certain measures to improve public procurement, such as: procurement consolidation, the definition of standards country-wide, the use of a single catalog, registered supplier data base, and the use of framework contracts.

Another important assessment on the matter, carried out by the Organization of American States (IDB-OAS 2012, p. 10) also repeatedly stated that among the major problems that affected the efforts made so far by the Costa Rican authorities was the fact that none of the initiatives could actually turn Costa Rica's procurement process into a 100% online traceable process. Public procurement efforts on the improvement of the national contracting scenario were focused on improving technical or specific procedures rather than on tackling the need to create a more complete and comprehensive public procurement system.

A joint study by INCAE Business School and the Technical Secretariat for Digital Government (TSDG) in early 2008 showed more evidence about this reality (Barahona et al. 2009, pp. 10–11). Based on the data from the General Comptroller's Office (CGR), the study estimated that in 2007 a small group of 20 companies billed the Costa Rican government 40% of their purchases, which is approximately 8% of the national GDP (Barahona et al. 2009, p. 6). The study suggests that this concentration "is mainly due to the barriers to participate in government's procurement processes representing system complexity and expensive it is for potential bidders" (Barahona et al. 2009, p. 6). Despite the progress and efforts made until 2009, the traditional model, followed by the Costa Rican procurement processes and based on paper-PDF-based procurement systems developed one by one within the public sector, fell short against the objectives of transparency, accountability, productivity, and development promotion.

National e-Procurement Platform: Mer-link

Before 2010, many attempts to improve Costa Rica's procurement model were carried out without noticeable success. They were not perceived as an effective solution to an increasingly evident problem. The challenge to modernize Costa Rica's procurement through a single-window process still remained.

As a result, the Technical Secretariat for Digital Government (TSDG), in partnership with the National Telecom Company (ICE), the Public Procurement Service (PPS) of the Republic of Korea, adapted the Korean e-Procurement System, known as KONEPS, into what is now called the Costa Rican National e-Procurement Platform, also known as Mer-link. This system began with the development and implementation of basic modules by July 2010, and its full scope was launched in January 2011.

A team of 14 public institutions, including national banks, universities, public agencies, and local governments, led by the TSDG and ICE through a strong standardization and Business Process Reengineering (BPR) process was able to shift a paradigm throughout the country's public administration. The interoperability model followed Mer-link's design led the country to build a basis to connect the government's back-office. The Mer-link system connected citizens, businesses, and government; transformed paper and red-tape-based public services to online, and established multichannel and one-stop transparency-based services.

As a result of these institutions' efforts, by 2012, Costa Rica reported several platforms used for procurement purposes. In the same year, the General Comptroller's Office (CGR is its acronym in Spanish) requested from the Governing Council a definition on the issue of public procurement. Consequently, CGR (2012, p. 22) issued a report that pointed out: "due to the large number of transactions generated by the public sector, it [was] necessary to consolidate efforts and automate the procurement process through a single channel. The channel must consolidate government goods and services transactions into a single IT e-procurement platform that integrates all the country's needs."

Given these recommendations, the Office of the President delegated to a National Public Procurement Committee constituted by the Ministry of Finance, Science and Technology, and TSDG's Director General, the integration of the National System of Public Procurement. The main objective of this committee was to implement Mer-link system as the national procurement service platform.

The Mer-link platform and these team's efforts in recruiting other autonomous agencies to use the platform and optimize its use are necessary precursors to this chapter. The detail story in its growth and development may be found across the Internet and through several international organization experts' reports, most of them in Spanish. Mer-link has been operational for 3 years with an expanding list of agencies (now 68 government agencies of over 300) conducting procurement through this national single-window platform.

As the national e-procurement system, throughout its interoperability model, Mer-link allows exchanging information with more than 50 institutions countrywide, all bidding-related information is integrated and publicly available. It has bridged the gap between a dynamic set of detailed information on government procurement and the citizenry. Costa Ricans are able to freely access and understand details of government procurement and budget expenditure, all accomplished by this platform on its purpose to enhance transparency in government procurement. At present, the system is being implemented and is expected to cover more than 90 % (by volume) (General Comptroller's Office, 2013)of national public procurement by the first semester of 2014.

One of Mer-link's strengths is that it handles the entire procurement process, which includes supplier registration, bid notice, bidding, awarding, contracting, payment, and the entire contract management process; hence, this project has become one of the most innovative government services within the national agenda. Once registered, suppliers are able to participate in all public tenders. The design contains the following main modules, which have been put into operation since 2010: supplier registration (user management), goods/services catalog (based on UNSPSC), bidding (procurement planning, online tendering, e-bond management (participation and performance), online bid submission, e-assessment, analysis and evaluation, and e-awarding), dynamic purchasing modules (e-auction, e-shopping mall, framework contracts), contracting (online contract issuance, e-signature/ digital certification), contract management (delivery, inspection, e-invoice, e-payment, supplier evaluation).

In spite of such complete functionalities, one could think that many of the described features are already available in some of the worldwide known practices,

why then is Mer-link acknowledged as an innovative solution to the national procurement dilemma? In the last stage of contract management, Mer-link has added a great value to the Costa Rican procurement cycle by including within its online service scope the entire administrative and disciplinary sanctions procedure. Empowering citizens through real accountability, allowing them to follow-up on how the procurement process is executed, moreover on how their taxes are being spent. At the same time, this innovative module enables online, real-time access to all procurement profiles, including detailed management process actions to key players, such as the Comptroller's Office, legal departments, audits, and the judiciary branch.

Mer-link's Scope

According to the Organization for Economic Cooperation and Development (OECD 2013, p. 97) there is a general concern about "the lack of attention dedicated to the risks of waste in the needs assessment as well as in the contract management" in public procurement. In particular, OECD's mentioned documentation addressed the importance of accountability throughout the whole procurement cycle, including pre-bidding and post-bidding phases. In this regard, Costa Rica has made a remarkable effort including all the mentioned phases within Mer-link's functional scope.

According to the Costa Rican legal framework, procurement processes are essentially divided into three stages, namely:

- Planning. In this initial phase the need to be satisfied is determined and the works, goods, or services to be acquired for a certain purpose are identified. This initial stage ends with the accurate identification of the good or service required, the verification of budget availability, and the procurement modality to use. This phase includes having a potential supplier database and a standardized coding of the good or service to be purchased.
- Selection. This phase is where the entity must seek the best proposal (for e.g., price, quality, and experience). It can be done through several mechanisms such as direct contract, abbreviated or competitive open tendering, dynamic contracting, reverse auction, or shopping mall, which is a figure known as "convenio marco" [In English: multiple award or framework agreement]. A direct contracting mechanism is mainly used for frequently procured goods and commonly required standard features. This mechanism involves a shorter period tender contest, and high volume with low value, meaning lots of low unit value contracts. Tendering in its various forms (abbreviated, competitive, international) is an appropriate mechanism for the selection of goods of very specific characteristics, or the acquisition of higher value goods, which means this mechanism involves high economic impact. The selection process ends with the contract or purchase order issuing, in the case of direct contracting.
- Execution/Contract Management. During this phase the contractor delivers the goods or services and the recipient verifies its validity and proceeds with pay-
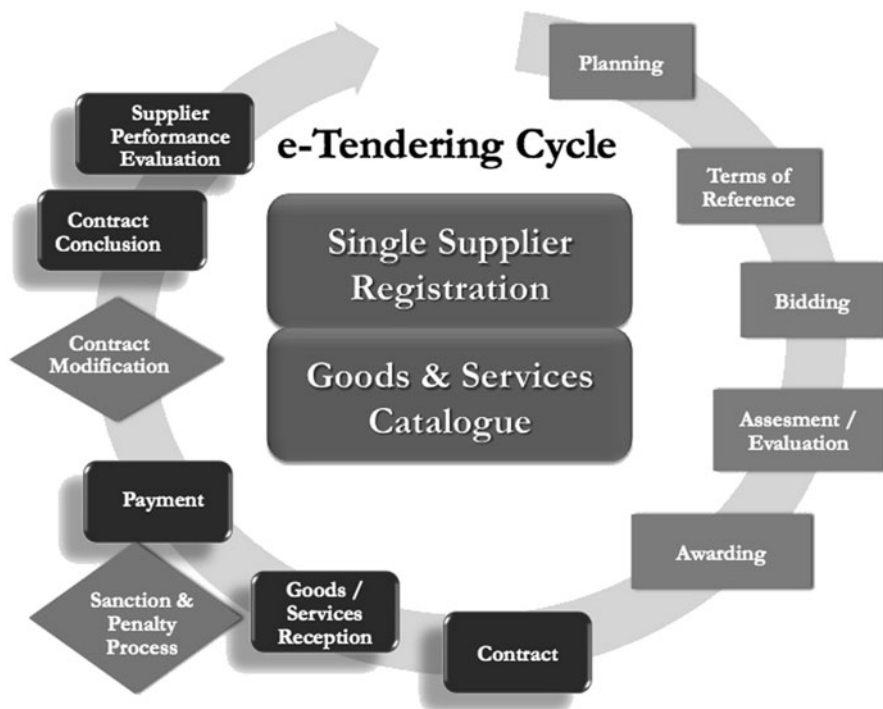
Fig. 1 e-Tendering cycle in Costa Rica and Mer-link's functional scope (Source: Self Elaboration)

ment. It ends with the final reception of all goods or services. This phase is related to the after-service for goods or services purchased. It involves any post-delivery action (such as warranty compliance) or condition stipulated in the contract or purchase order. This phase ends on the last day of the warranty.

Within all of the stages, portrayed in Fig. 1, there are a number of key features to drive characteristics such as efficiency and productivity in the procurement process, through the use of technology. At the level of a public procurement cycle in Costa Rica, the following image and related statements will provide a glimpse of Mer-link's model main features and how they constitute an innovative process.

Planning

Single Vendor Registration also known as Register of Bidders

Costa Rica's greatest weakness in terms of procurement before the implementation of the Mer-link system was the fact that potential suppliers had to go to each government procurement department (300+ institutions) and provide a series of requirements to be included and registered in the official supplier database. In a study

carried out by INCAE Business School, it was determined that the cost of these requirements amounted to US$ 2000 per process. The fact that it was so complicated and expensive to register as a government supplier explains how difficult it was for an SME to actually be invited into a public tendering process.

Thanks to the extensive use of digital certification, based on public key infrastructure technology, Mer-link enabled a single nation-wide online supplier registration. This is a countrywide database, where the professional or company representative may sign in (and update information) and make sure to be invited to any potential business opportunity with the government. Through digitally signed declaration and interoperability processes, the company's data, such as legal status, capital, ownership, social security, and tax payment status may be verified online on a real-time basis. Up to date, Mer-link accounts more than 7000 potential suppliers. This massive online process has opened a very important door of opportunity for both procurement departments and potentially interested supplier companies, especially SMEs.

National Goods and Services Catalog

As the supplier registers the company in Mer-link, he/she must select from the online product catalog the goods or services that his company is in capacity to provide to the government. This catalog is based on United Nations Standard Products and Services Code (UNSPSC) classification. Once registered, the vendor will be notified (through e-mail and/or SMS) and to their inbox in the Mer-link system an official notice to participate every time there is a potential business opportunity with the government, according to the listed products and based on the related product classification.

Mer-link's organization has an expert unit trained to ensure correct classification and technical specifications of every product. Every good or service is added and classified into Mer-link's catalog through this unit and all procurement procedures base technical descriptions in this catalog. The principle behind the catalog's design is to standardize all products purchased by the government, ensuring quality in technical specifications as well as preventing bad technical interpretations and corruption practices. Another important principle is to establish a common language between private sector (vendors) and government procurement departments. The use of a unique catalog has enhanced efficiency and reduced operation costs and processing time.

One of the benefits that may be accountable to the use of the UNSPSC catalog is the enhancement of the logistics and supply chain management of public entities, thus reducing inventory levels through better management of information on available products. Additionally, it enables an accurate mechanism to compare prices of similar products and therefore speeds up the procurement selection and decision-making process. Thanks to the data collected and standardized within Mer-link's catalog, the country can use detailed statistics and important business intelligence tools for feedback about the national public procurement policy-making, and streamline organizations' operation and general management strategy.

According to several vendors' opinion surveys, Mer-link's catalog facilitates sales functions, introduces online marketplace activities between private and public sectors, ensures the quality of product technical information, streamlines the introduction of new products to the public procurement market, and facilitates collection of sales data.

Budget Management

One of the general features of Mer-link's product classification is budget/expense code classification; this allows the system to establish a seamless workflow between procurement and the accounting process. Starting from the planning phase, Mer-link will interconnect with the institution's accounting or financial system confirming budget availability to start certain contracting procedures and follow on with publication of the terms of reference.

Procurement Order/Request

The order request is the final step of the planning phase. In the traditional model (paper-based), this request was an e-mail or official letter from a certain division within any public institution addressed to the procurement division director, formally requesting the need to buy a good or service.

This platform was designed to be used by large and small institutions even one as large as ICE, whose organization accounts more than 45 working units or as small as a local government office or a public school's board. Depending on the institution, the internal process could vary, and Mer-link's standard workflow should be able to fit all working schemes. Mer-link's modeling and standardization efforts were expressed in an electronic document, a form which is filled out by an assistant/analyst, approved and digitally signed by the division's chief or director. Depending on each institution's configuration, Mer-link's flow will automatically submit this order request to procurement department users who will proceed accordingly. The form is the kick-off point of the current public e-procurement process and therefore of any procurement process e-record or transcript. The data on this e-form will feed later stages in the procurement cycle.

Selection

e-Tendering, e-Bidding

Based on the data entered and submitted on the procurement order or request, any user institution will be able to publish terms of reference (also known as RFP) and start a tendering process for any contracting mechanism established on the Costa Rican procurement legal framework. Once the user publishes the terms of reference, the system will generate a robust security mechanism based on PKI technology

(using a unique encryption mechanism for each procurement process) with which, at the correct moment, the designated user will be able to open the chamber where electronic bids will be encrypted and stored. The system's functional design allows any bids to be signed at a personal, corporative level, and even at a joint bid or consortium level.

Depending on the goods or services selected on the catalog, Mer-link will send immediate notifications (through SMS or E-mail) to all potential vendors and the clock on the tendering procedure will start ticking. Any questions, remarks, or complaints on the published RFP may be managed through the platform. This step ensures that physical visits or meetings between vendors and public officers are avoided.

Similar to the previous phases, interested vendors may present their proposals. Companies fill out a form responding to their compliance with all details and specs of the RFP. Through digitally signed e-documents, each vendor's bid will be encrypted, electronically submitted, and locked-up in a chamber. The bids will not be available until the corresponding date and time selected to start the assessment and awarding phase. On the matching moment and with the key generated at the RFP publication phase, the procurement officer in charge will be able to open the chamber and proceed with the assessment phase.

A key innovation aspect in this stage is that throughout Mer-link's portal publicity the Costa Rican Government has allowed the site's publicity to substitute the obligatory publication of public bidding proceedings in the local Gazette newspaper. This decision not only generates paper- and operation-related efficiencies but also important savings in institution's printing expenses transferred to the National Gazette.

e-Bond or Collateral

Another important value added to this online process is related to the participation, warranty and performance bond issuance. In the traditional paper-based model, companies had to visit an insurance company or a bank, provide certain requirements, and issue a paper-based bond, which they had to attach to their paper-bid. Nowadays, Mer-link connects nationally to all 15 bond issuing public and private entities. Included are the National Insurance Institute, Costa Rican Bank, Scotiabank, Bansol, Promerica, and Lafise. The interoperability has streamlined the warranty-related workflow not only for potential government supplier companies but also for public procurement departments, which required a team (up to 5 resources) for bond management purposes. To this date, bonds issued in relation with any procurement process in Mer-link are issued electronically by the corresponding entities and reflected automatically in the bidding process, once the bid is opened. The system will provide to the procurement departments the necessary tools to manage the warranty issuances, amounts, valid period, expiration, and renewal dates.

Assessment/Evaluation and e-Contract

Once the procurement analyst opens the bids, Mer-link will order them automatically according to the evaluation criterion previously defined by the public institution (on the RFP). For instance, if the evaluation criteria would be 100 % based on the price, then Mer-link would display a table comparing all the received bids and place the lowest priced one in the first row and order the following ones according to the price.

The national e-procurement tool was designed in such a way that the institutions may select and define any kind of evaluation criteria or different variable combinations according to their specific needs (whether it is price, experience, quality certifications, cost effectiveness, energy efficiency, post-warranty). Mer-link will only provide important hints and efficiencies in the process; however, the procurement decision and responsibility will rely on the system's users, whether they are public officers or supplier company representatives.

Following-up with the process, the officer in charge of the corresponding contracting process will check the received bids through the table generated automatically by Mer-link (ordered according to the established criterion). The officer may review that the procurement-related conditions are covered and may forward the bids for an expert review. For example if the public institution is buying computers, then the procurement analyst may review the tenders' eligibility. The procurement officer must confirm that tenders comply with basic conditions, such as stamps, participation warranty bond, no tax and social security liens. The procurement platform will issue a bid opening summary. This is an e-document where all acts related to the chamber opening and bid review proceeding are recorded.

After the time for bid opening is issued, the procurement analyst in charge may forward the bids for technical review to a designated IT department analyst who may check that the computers offered by the bidding companies comply with the requested specs. IT analysts will check and compare the proposals and provide his technical recommendation on the best option.

Once this internal workflow is completed, procurement analysts will be able to award the best proposal and notify that winner. To make this selection official, the procurement department may request that the selected vendor submit payment of certain duties and an online presentation of a performance bond, etc. Once the awarded company fulfills these steps, the public institution will issue an e-purchase order or e-contract (depending on the contract's amount and chosen mechanism). All approval levels within the workflow described in the national legal framework to issue this contract (for example if the contract needs to be confirmed by the National Comptroller Department or by the highest level department within an institution, such as the Board of Directors or Procurement Commission) are all available features in this electronic tool. Given the fact that there is no paper involved, all these steps for internal or external approval are followed through using the system and e-signature features. The e-contract (or e-PO) will be issued by the institution and electronically submitted in an e-document to the selected vendor. This e-document will contain all legal responsibilities and rights between the parties and is as valid as a paper and manually signed one.

Contract Management/Execution

e-Reception, e-Invoice, e-Payment

From the moment the e-contract is signed by the parties and notified, the selected vendor should start working on the provision of the contracted goods or services. In this regard, Mer-link's e-procurement platform is being used in such way that the system connects with logistics and asset management systems, internal management systems allowing public entities to streamline their supply chain management. To follow-up with the previous example, the selected computer vendor will notify through Mer-link's system the amount and characteristics of the computers to be delivered, according to the contract's specifications. Thanks to Mer-link's smart catalog system and technical specifications tabs, the computers to be delivered may include important asset management features such as GTIN (Global Trade Item Number) identification or include inventory number plates. Once the vendor sends the information on partial or total delivery of the products, warehousing public officers will be able to check with the system and crosscheck the correct delivery of goods according to agreed conditions. The warehousing staff will provide a partial reception, which will always be confirmed by technical report, which in this example will be issued by the IT department. The latter will be in charge of checking the conditions of the computers and finally approving in the system the correct delivery of the products. This process is similar for services and works; however, due to the nature of professional services and public works the partial and complete dispatch and reception confirmation is done through different kinds of supervisions. All variables are included in Mer-link's system functionality and therefore in the procurement record of every process.

Once the stakeholders confirm the reception, a final acceptance e-document will be issued and the vendor may proceed to request payment. Although the Costa Rican tax system does not yet practice a general use of e-invoice, as of 2014 e-invoices will be implemented for certain industrial and professional service sectors. At present, Mer-link's design includes the use of e-invoice and also a digitalized/scanned copy of the invoice that must be physically submitted to the institution's financial and accounting authorities. When e-invoice is fully implemented, the country will issue the necessary regulation for its use. Mer-link has been already prepared for this step. Nowadays, the vendor will issue a payment request upon the goods/services reception confirmation, and submit the original copy of the invoice to the institution. Through connection with payment and financial systems, Mer-link will feed the accounting or financial system regarding that payment and through a national interbanking platform, known as SINPE, Mer-link will be able to issue payment. This means, Mer-link's system, through an interconnection with SINPE, will deduct the money from the entity's account and deposit it as the vendor had requested in a previous step. This process is most commonly used by local governments or small public entities that do not have a complex or online payment system to connect to and therefore, for them, the Mer-link system has meant a big step not only to streamline the procurement process but also for payment and the

accounting process. On the other hand, the connection between Mer-link and the accounting systems may work also the other way around, which means Mer-link will only inform the institution's accounting system with all the information the vendor has provided on the payment request that a payment must be made. Following this, the internal payment system will be in charge of transferring the related funs and report to the Mer-link system that the payment was successfully made or not. Currently, big government institutions, such as ICE are using this latter procedure.

Contract Conclusion (Modification, Expansion)

The moment all contracted goods/services are delivered, paid and their warranty expires, the contract execution phase will be concluded. However, many contracts, especially in public works or complex objectives will undergo contract modifications. These changes may be caused and requested by one party or by both parties. They may include scope expansions and therefore additional payments or just an extension on the agreed duration of the contract. All these changes on the original e-contract will undergo certain requirements, which are included in the Costa Rican legislation. In this regard, all contract modifications are included in Mer-link as an appendix of the original e-contract. This appendix is represented through the numeration series of the e-document, adding to any additional or expanded contracts, for example if the original contract number is 123456789 the amended one will be 123456789-01.

e-Record

As mentioned in previous sections, Mer-link's e-Record tracking feature is one of its most important characteristics, which highly provides public procurement transparency and accountability. In this regard, it is important to emphasize that the national e-procurement platform keeps records in real time of all actions related to procurement procedures by using standard protocols to number and label each section of each phase of the procurement cycle. This enables that lawyers or judges in any dispute or trial may always find and refer to certain information in the labeled sections or procedure stages. It is Mer-link's design pillars and part of its original vision to promote traceability. This can only be accomplished by handling one single record with all actions and related information and documents of each process.

Administrative Dispute, Penalty also Known as Sanctions

Although traditional procurement IT systems worldwide basically focus on supplier registration, catalogs, tendering, direct procurement, claims, and endorsements, they generally do not get involved in the issue of contract management and execution. Commonly known systems solely handle reception, final acceptance, supplier evaluation, and payment.

   In this regard, if all contract conditions were successfully and timely complied with, then the process would go directly to the vendor's performance evaluation and contract's closure. However, if any dispute regarding the contract's execution arises between the stakeholders, then the coordination of a private hearing, internal resolution committee appointment, and process resolution will be required. If this module had not been integrated into the system's scope, then public institutions would have to be forced to open a parallel paper record to follow the dispute resolution and penalty administrative process. This would highly prejudice the transparency level envisioned for Costa Rican national procurement.

   The fact that Mer-link handles all this process in a seamless way, enabling the corresponding authorities to manage every detail of the contract's process management in real time and process this complicated mechanism through an efficient IT tool has set an example toward real time, totally online, zero paper e-procurement process. This innovative module, which actually represents a subsystem within Mer-link's IT architecture has being successfully implemented into the tool's scope and is known in Spanish as "Procedimiento Administrativo Sancionatorio" (or "Sanctions/Penalty and Administrative Dispute Proceeding").

   This added-value module includes in its scope all actions referred to dispute resolution and sanction or penalty application toward a supplier or public officer who did not comply with public contracting regulations. The following are the specific features contained in the regulation (Public Administration Law and related ones) and therefore within Mer-link's functionalities:

- Absolute manifest nullity of a procurement procedure
- Prohibition or warning of a vendor or contractor
- Contract resolution or termination
- Fine or penalty clause application (toward the contractor who failed to comply with the contracting conditions and procurement regulations)
- Collection and payment of damage costs to a contractor, and
- Performance, participation, compliance, or collateral bond execution

With this contract management module, public institutions in Costa Rica are able to handle the necessary administrative procedures electronically with a greater value: the fact that whatever the final resolution of this process may be, the users will be able to affect the procurement process in a smart and efficient way. For example, Mer-link does not allow the contractor to request a reception or payment of a contract that is undergoing an administrative dispute procedure and its final resolution has not yet been issued. Additionally, this important subsystem within Mer-link's platform scope complies and follows all steps and procedural safeguards established by applicable legislation, such as:

- *Administrative, Dispute Management Process Initiation*. The module allows the institution to develop the statements that constitute the preliminary report in which the alleged failure of the bidder/ contractor is documented, detailing facts such as alleged damages caused to the institution, alleged unfulfilled standards, conditions or regulations, and all related proof.

- *Appointment of the Dispute Resolution Council*. Mer-link will provide special e-forms for the selection, recommendation, and appointment or the members (whether a group or individual) that will serve as referee in the process. This council will be responsible for conducting a correct and efficient dispute resolution or sanction process. If any appointed party requires to be held out from this process for any applicable reason (for example: conflict of interests), Mer-link's functionality will enable selection of a new member for the council.
- *Initial Act*. (Also referred to as Administrative Procedure Initiation) The system allows holding the initial stage of the dispute process where the stakeholders are informed of the alleged contract infringement. This stage includes information on the contractor's rights and the legal foundations for the alleged breach and the corresponding proof.
- *Bidder/Contractor Disclaimer/Evidence Presentation*. The module allows the contractor to carry out his defense, directly (personally) or through the appointment of a representative, who receives electronically the notice of the administrative procedure initiation, and may present relevant disclaimers and evidences.
- *Final Act*. Once the appointed council has analyzed all related information, the council members will input the decisions taken and register them in the system (date, time and user information will be recorded) and the system will communicate the final act to the stakeholders.
- *Appeal*. The module supports the presentation of legally valid appeals in an electronic form. These claims may be against either the initiation or final act. Mer-link's intelligence will allow the contractor to request a two-tier appeal, according to the current national regulation. In the latter case, the appeal action will be transferred to two different levels automatically: to the dispute resolution council and to the applicable judicial department.
- *Private E-Record*. According to Costa Rican regulation on this kind of procedures. The record during the administrative and dispute resolution process is private. Only the parties involved will have access to it, however the content of the final act's resolution will become automatically available once it is officially published.

Innovation in Contract Management: Mer-link's Case

Through this e-procurement tool, institutions in Costa Rica and its citizenry will have a complete electronic record available for public auditing and scrutiny. According to the Costa Rican legal framework, e-government and open government policies, this system will set an important milestone for the country's public administration practice development toward important new trends which enhance citizen's direct participation and collaboration between government and civil society.

Mer-link is a national platform; it offers advanced and complex functionalities to all users involved—whether private sector vendors or public institution users. It not

only automates the entire contracting but also provides an advanced service to its users. Beginning with the capacity to overcome physical barriers of space and time, this procurement IT tool allows a more transparent and efficient flow of information and greater access to data and government accountability services. As part of its operation model, the system provides free training twice a week to vendors, as well as free e-learning courses that may be downloaded from the portal site www. mer-link.go.cr.

Mer-link as a successful government initiative has accomplished the establishment of a practical example of sustainable procurement. This statement is based on three important perspectives. First, the fact that government contracting is oriented toward an economic perspective, enabling savings of 12 % through lower prices of products due to substantial cost reductions and higher participation promotion in public, open contracts. Followed by a social vision, where Mer-link has ensured promotion and enabling small and medium enterprise's participation by accomplishing a US$ 1500 process reduction on bidding participation costs (eStrategia Publica 2014). Last but not least, this procurement initiative has followed an environmental vision, which includes a paper-less design from scratch, preventing physical transportation and visits to public institutions and promoting through an ubiquitous online service, lower-to-none procurement related visits to institutions and therefore reduced transportation effects, lower fuel consumption and gas emissions.

In this regard, the platform's organization has accomplished important growth during the past years. It was recognized in 2010 at the national level as the most innovative science and technology based innovative initiative (Ruiz 2010). In 2012, the system was granted a regional award that acknowledges excellence in e-government practices, the ExcelGob Awards(Vargas 2012). Recently being appointed as national e-procurement system, it has projected potential operating savings of US$ 165 (Ruiz 2010). Currently available real-time statistics in the Mer-link portal report that it has more than 97,000 goods and services in its national catalog, 7500 registered vendors, and has enabled contracting procedures for US$ 181 million (Mer-link, 2014).

Within government practices, Mer-link complies with basic conditions to carry out innovation. It transformed a process, which was hardly available to the citizens (due to space, time, and paper barriers) to an online, cloud-based 24/7/365 available service. It enabled dissemination of important ideas in a new context: Mer-link has made it possible for a citizen to gain trust in public expenditure and management, through its real promotion of transparency, efficiency, and procurement data democratization.

Innovation can be defined as "the process of improving, adapting or developing a product, system or service to deliver better results and create value for people" Fox, T. & Brewer, H. (2011).This definition confirms that Mer-link's case, its scope and its service platform have accomplished a no-return development process within government procurement.

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