Imagine a future where:

- Your Corporate Real Estate and Facilities Management (CRE&FM) time and talent are maximized
- Your team is focused on strategic insights and decisions, rather than on routine tasks
- CRE&FM data is harnessed real-time to understand how your portfolio, sites, and organization are performing
- Disparate data sources and systems are interconnected and optimized

Far from being an alternative reality, your CRE&FM organization could be operating this way now with the help of robotic process automation (RPA). RPA is a tool that can help CRE&FM organizations drive improved performance by automating repetitive manual tasks, traditionally performed by humans.

This Deloitte point of view is the first in a two-part series on how to apply RPA in the CRE&FM environment, specifically addressing:

01. What is RPA?
02. What does RPA do well?
03. Where can CRE&FM organizations leverage RPA?
04. How does RPA create value?
05. What are the elements of a realistic and executable RPA roadmap?

This first part addresses the initial three questions, and the second part will provide a deeper dive into specific RPA use cases, describing the value it can create, and presenting a practical RPA adoption journey.

By Francisco Acoba, Abby Levine, Alina Tousain and David Kaplan

Corporate Real Estate and Facilities Management in the digital world
Applications of robotic process automation
What is RPA?
RPA involves the deployment of software robots, called “bots,” to lower the cost and increase the effectiveness of routine clerical processes.

For CRE&FM organizations, the RPA capabilities could be transformative too. Many CRE&FM organizations today have more business processes, data, systems, technologies, and regulatory requirements than ever before, but they don’t have expanded IT budgets and personnel to absorb the extra work.

As an alternative, governed by pre-defined rules RPA solutions can perform routine, repetitive clerical tasks. By deploying bots to handle such tasks, CRE&FM organizations can reduce operating costs while reassigning the personnel’s responsibilities to higher value tasks. RPA can become the foundation for more sophisticated applications of automation, such as cognitive automation and machine learning, which can augment human decision making and take on more complex tasks.

What does RPA do well?
RPA can be embedded in the traditional business operating models where bots could perform tasks, such as:

- Receiving and collating data via email/workflow
- Copying, pasting, and inspecting data
- Moving files and folders
- Logging into web and enterprise applications
- Filling in forms and transferring data to templates or systems
- Mining and extracting data from the web
- Performing calculations and pre-defined adjustments
- Extracting structured data from documents and source systems, and uploading, emailing, and reporting information
- Collecting social media statistics

RPA bots are most effective when the tasks and processes they perform have the following five key attributes, as shown in Figure 2.

1. Highly transactional
   Processes which have a high volume of transactions, are performed frequently, and are typically repetitive in nature

2. Time consuming
   Processes with a high volume of manual interventions and labor-intensive steps

3. Highly scalable
   Processes that experience seasonal changes in transaction volumes

4. Low-complexity rules
   Processes with steps that can be governed by simple, unambiguous business rules and do not involve judgement or fuzzy logic

5. Highly standardized
   Processes that are stable over time with limited exceptions in the execution of steps
Corporate Real Estate and Facilities Management in the digital world  Applications of robotic process automation

To illustrate the kinds of processes which are suitable for RPA and the impact that RPA can have, below are three real-world success stories from Finance and IT functions which automated similar activities commonly performed by CRE&FM organizations: generating reports, reconciling invoices, and maintaining asset classifications.

**Success Story 1: On demand and periodic report generation.** RPA bots were adopted by a global consumer products manufacturer to create standard, repeatable reports across multiple business units and disparate reporting systems (Figure 3). The process selected for automation was moderately complex, required four weeks of implementation and resulted in:

- **Increased speed**—reduced the time required to create reports from 120 to 30 minutes, leading to higher throughput
- **Increased accuracy**—reduced errors from manual data entry and calculations to zero
- **Shift in human focus**—reallocated capacity to develop new competencies and build expertise, by enabling employees to focus on making business impact rather than clerical work
- **Increased consistency**—generated centralized, on-demand and ad-hoc reporting, increasing quality and consistency of data, allowing for standardization of the process

![Figure 3. Generate on demand and periodic reports](image)

**Success Story 2: Invoice to contract matching / reconciliation.** RPA bots were leveraged by a large US-based custodian bank to replicate highly manual invoice-to-contract matching in multiple languages (Figure 4). The process selected for automation was highly complex, required seven weeks to implement and allowed for:

- **Increased revenue**—reduced revenue leakage by 4%, by identifying situations where invoice amounts were higher than contractually allowed amount
- **Shift in human focus**—matched 96% of invoices to contracts on the first bot pass, requiring only 4 percent of exceptions to be processed by humans; FTEs were redeployed for exception handling, payment optimization analytics and cash flow management
- **Higher throughput**—automated 99% of reconciliations on a 24x7 schedule

![Figure 4. Match invoices to contracts](image)

**Success Story 3: Data maintenance.** RPA bots were deployed at a US-based health care provider to automate manual tasks in the data maintenance process related to assets and their depreciation (Figure 5). The process selected was moderately complex, required five weeks to implement and resulted in:

- **Reduction in costs**—reduced cost of data maintenance by a run rate of $125,000 per year driven by a decrease in FTE requirements
- **Increased accuracy**—reduced errors from manual data entry and incorrect classifications to 10%

![Figure 5. Maintain asset data](image)
Corporate Real Estate and Facilities Management in the digital world - Applications of robotic process automation

Where can CRE&FM organizations leverage RPA?
Considering the RPA suitability attributes just described, multiple processes across the CRE&FM lifecycle are potential candidates for RPA (Figure 6), including:

01. Portfolio management
02. Facilities management
03. Workplace optimization
04. Capital projects management
05. Performance management
06. Program management

The suitability of RPA “bots” for a given process is expressed in terms of the percentage of tasks or steps, within an end-to-end process, that can be automated:

- **High RPA suitability**, means that more than 70 percent of steps in the process can be automated
- **Medium RPA suitability**, means that 30 to 70 percent of steps can be automated
- **Low RPA suitability**, means that below 30 percent of steps can be automated

Figure 6 below presents the RPA suitability heat map for selected CRE&FM processes:

<table>
<thead>
<tr>
<th>Real Estate and Operations</th>
<th>Workplace and Capital Projects</th>
<th>Performance and Programs</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Real Estate Portfolio Management</strong></td>
<td><strong>Facilities Management</strong></td>
<td><strong>Workplace Optimization</strong></td>
</tr>
<tr>
<td>Compile legal and contractual documentation</td>
<td>Schedule facilities management activities</td>
<td>Monitor and refine workspace optimization</td>
</tr>
<tr>
<td>Manage and report critical dates and milestones</td>
<td>Process utility billing</td>
<td>Manage occupancy</td>
</tr>
<tr>
<td>Manage portfolio data and documents</td>
<td>Monitoring utility consumption</td>
<td>Maintain space and occupancy data</td>
</tr>
<tr>
<td>Abstract lease and associated documents</td>
<td>Create inventory</td>
<td>Complete asset documentation</td>
</tr>
<tr>
<td>Manage payments and receivables</td>
<td>Manage Security Access</td>
<td>Archive documents</td>
</tr>
<tr>
<td>Conduct reconciliation and manage disputes</td>
<td></td>
<td>Perform financial contract closeout</td>
</tr>
</tbody>
</table>

**Legend**
- **High** - More than 70% of activities can be automated
- **Medium** - Between 30% and 70% of activities can be automated
At the task level, some notable examples include:

- Maintaining a real estate portfolio with up-to-date space, occupancy and cost data
- Uploading data to an integrated workplace management system (IWMS) or other portfolio management tools
- Assembling and organizing performance management data from multiple disparate systems to create regular reports
- Managing additions, edits, and deletions in security and building access systems
- Compiling utility bills, occupancy data, and weather reports to assess energy consumption and management
- Creating standard contracts for leases and constructions bids, especially those involving a large number of vendors
- Maintaining customer and vendor data

Call to Action for CRE&FM Organizations

Now that we understand what RPA is, there are a few questions for CRE&FM leaders to ask themselves to get started understanding RPA opportunities within the context of their own organization:

01. Are there routine CRE&FM processes which require significant manual labor to accomplish?
02. Does the CRE&FM organization have access to regularly updated portfolio data combining real estate fundamentals, lease status, personnel and financials? What is the manual work load to maintain portfolio data? How many different data sources are currently being aggregated and how often is the data updated?
03. Does CRE&FM utilize an IWMS system? If so, what is the manual work load to maintain updated and correct data?
04. Does the CRE&FM organization generate data (from building systems, facilities maintenance systems, work order systems) which are not used for anything yet because there is insufficient time or resources to organize and analyze the data?
05. Are other departments within the company (HR, Finance etc) already investigating or deploying RPA? If so, can CRE&FM leverage their leading practices/governance/capabilities to create a pilot?

Depending on the answer to each of these questions, the opportunities for deployment will begin to become clear. Robotic process automation is changing the way businesses are run, and soon it will change the way CRE&FM organizations are run. Are you ready?

Coming soon, part two of this series will take you through a deep dive into an RPA deployment in a CRE&FM organization and will present the roadmap through the RPA lifecycle to help you get started.

Contact us:

Francisco J. Acoba
Managing Director
Deloitte Consulting LLP
Tel: +1 212 618 4432
Mobile: +1 202 368 9406
Email: facoba@deloitte.com

Abby Levine
Principal
Deloitte Consulting LLP
Tel: +1 213 553 1921
Mobile: +1 310 498 5593
Email: ablevine@deloitte.com

Alina Tousain
Manager
Deloitte Consulting LLP
Tel: +1 617 449 5223
Mobile: +1 617 369 2311
Email: atousain@deloitte.com

David Kaplan
Manager
Deloitte Consulting LLP
Tel: +1 404 220 1982
Mobile: +1 678 576 9588
Email: dkaplan@deloitte.com

This publication contains general information only and Deloitte is not, by means of this publication, rendering accounting, business, financial, investment, legal, tax, or other professional advice or services. This publication is not a substitute for such professional advice or services, nor should it be used as a basis for any decision or action that may affect your business. Before making any decision or taking any action that may affect your business, you should consult a qualified professional advisor. Deloitte shall not be responsible for any loss sustained by any person who relies on this publication.

About Deloitte

Deloitte refers to one or more of Deloitte Touche Tohmatsu Limited, a UK private company limited by guarantee (“DTTL”), its network of member firms, and their related entities. DTTL and each of its member firms are legally separate and independent entities. DTTL (also referred to as “Deloitte Global”) does not provide services to clients. In the United States, Deloitte refers to one or more of the US member firms of DTTL, their related entities that operate using the “Deloitte” name in the United States and their respective affiliates. Certain services may not be available to attest clients under the rules and regulations of public accounting. Please see www.deloitte.com/about to learn more about our global network of member firms.

Copyright © 2019 Deloitte Development LLC. All rights reserved.