RPA Success Remains a Non-Trivial Endeavour

Robotic Process Automation (RPA) is becoming an integral part of today's businesses that compete in more dynamic business environments. RPA is a technology that enables organisations to automate rule-based and repetitive tasks in processes through the use of software robots. Instead of requiring time consuming process reengineering that leads to heavy investment on IT system transformations, RPA is able to perform such routine processes by running across systems. For an example, customer orders of a third-party logistics service providing company can be easily entered into internal warehouse management system using RPA. Therefore, RPA can be interpreted as a strategic tool which gives benefits such as improved productivity, improved data accuracy, improved compliance levels, reduced process execution time and costs. However, Nitin Bhatt [1] mentions that, nearly 30% to 50% RPA projects are failures. Accordingly, there are some other factors organisations must consider apart from technological knowhow when taking RPA initiatives. This article intends to reveal such factors identified through an industry survey and interview sessions conducted with 12 industry experts who have at least three years of experiences in supply chain and RPA disciplines. Overall, fourteen factors were identified under three categories namely: Strategy; Process; and Organisation.



Figure 1: Critical Success Factors for Scaling Robotic Process Automation

Strategy: RPA has the potential to transform the way an organization performs its core functions. However, in order to realize this potential, RPA needs to be integrated into the broader context of the organization's strategic objectives. This requires RPA to be viewed as an enabler of those objectives, rather than a goal in itself. Therefore, the objectives of the RPA initiative should be aligned with the organizational objectives to achieve the long-term success of the organization

Process: Preparing the base for automation is necessary to successfully implement robots with less resource costs. Software robots in the RPA technique follow rule-based and repetitive tasks. Hence, it is required to have a clear, well-defined and immutable processes to implement software robots. This sometimes requires redesigning the existing processes by introducing new standards such as standard documentation formats for external and internal process users. Besides, choosing the right process for automation is must to gain the organisation-wide benefits. This requires identifying most suitable process among several potential processes for automation, after having a close look at business goals and organisation's process culture. Our findings suggest that factors such as volume, scale, stability, labour intensity, repetitiveness, complexity, data input type, impacts for both internal/external stakeholders and benefits must be identified and compared for all potential processes when choosing a process for automation. Analysing the existing state of the process at the pre-implementation stage is another factor which has a strategic importance. It helps to identify the issue properly and to understand the way the process is functioning. Hence, it helps to identify and confirm the automation need. Moreover, it helps to identify the process stakeholders and clarify their capabilities to deal with RPA solution.

Organization: Prioritizing the benefits helps to determine the relative importance of each benefit and to determine the efforts and resources required to gain each benefit. Hence, it helps to choose the right process for automation. The main intention of this step is to gain a better under-

standing on how RPA solutions can be leveraged to improve organizational performances. It provides a direction for the RPA journey by removing challenges related to lack of resources.

When an organization is implementing RPA, it is important to identify all the stakeholders who will be impacted by the automation. In the case of replacing human workers with robots, the primary stakeholders are the employees who will be replaced from their jobs. However, it is also important to identify the external stakeholders such as customers and other internal stakeholders who will be impacted by the process change. Improper identification of the stakeholders and the impact on them will result in a risky environment in the middle of the project, which leads to resource wastages.

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Conducting a feasibility study is critical for a successful RPA implementation as it helps to choose the right process for automation. Feasibility must be assessed under two aspects: process feasibility and initiative feasibility. Process feasibility consists of two stages which are process examination and technical feasibility. Initiative feasibility is about the comparison of benefits projections over cost projections further helps to confirm the suitability of improving the process with RPA with reference to the time and organization strategies. As per our study findings, a feasibility study allows an organisation to compare other possible improvement methods with RPA which eventually helps to confirm RPA as the best method.

Our study also identified that having a pilot project before start of the actual project is another success factor. Conducting a pilot project before the actual implementation allows the initiative team to identify possible risks and further improvement opportunities which was not observed during previous stages. Identification of risks especially related to the background of the RPA such as IT systems and other software applications helps to mitigate project failures that can happen in the middle of the project. Pilot projects help to track such issues and allow organisations to get confirmation about the possibility of reaching target benefits.

Even though RPA is a technological solution, it urges the involvement of people with both technical and operational background under the RPA project team. People with technical background have to carry-on required analysis and develop bots. On the flip side, people with the operational background have to provide process knowledge and user acceptance for the automation. Top management involvement and commitment are critical for a successful RPA initiative. As per the study findings, there are some challenging instances that we can overcome only if we have the top management involvement and commitment. Further, having top management involvement provides a motivation for the team and the team can receive timely incentives required for project resources.

Training and awareness on RPA helps to fulfill knowledge gaps prevailing such as technical knowledge required to develop software robots and knowledge required to work with the automated process. Further, our study implies that proper training also facilitates easy change management and a good foundation for a long RPA journey. On the other hand, the introduction of RPA into an organisation can be a staggering undertaking. In order to ensure the success of RPA implementation, organisations must ensure they have a change management plan in place. Hence, it is important to plan for the resistances when implementing RPA so that end users will not have to stuck with such instances. Moreover, involvement and commitment of all stakeholders throughout the RPA implementation is important to complete the RPA projects without failures.

According to the research findings, strong leadership is important to manage and coordinate all requirements of the project. Thus, having a leader for the RPA project team is imperative to save resources through proper management. Besides, a team leader acts as a great motivator who ensures the engagement of all stakeholders and timely communication of project requirements to stakeholders. Further, continuous monitoring of results and progress helps to track the extent of benefits realization. A software robot itself cannot monitor the progress and adjust naturally in align with continuously changing business practices. Hence, monitoring the progress externally is really important. It helps to identify further change management requirements that were not identified during the implementation.

This article highlights some important factors decision-makers must consider apart from the technological know-how when taking RPA initiatives. In addition to that, there are some factors which have an influencing power on other factors [2]. Therefore, it is necessary to identify the inter-dependencies between such factors because non-existence of some factors eventually act as a barrier for other factors.

References:

[1] N.Bhatt, "Five design principles to help build confidence in RPA implementations | EY - Global," Ernst & Young Global Limited, 2019. https://www.ey.com/en_gl/consulting/five-design-principles-to-help-build-confidence-in-rpa-implement (accessed Apr. 06, 2022). [2] A. Piyatilake, I. D. Vitharanage, A. Thibbotuwawa, and H. N. Perera, "Benefits of Supply Chain Process Improvement Initiatives: A Structured Literature Review," J. South Asian Logist. Transp., vol. 2, no. 1, p. 77, Mar. 2022, doi: 10.4038/JSALT.V211.43.

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