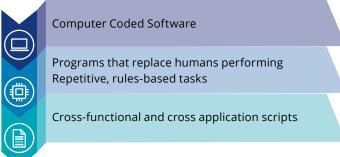
Deloitte.



Robotic Process Automation

Introduction

Robotic Process Automation refers to a software application (or BOTs) that replicates the actions of a human user with the user interface of a computer system



Higher levels of regulation and more challenging regulatory Over the last couple of years, we have established our expectations in recent years have resulted in significant costs credentials in the Innovation and RPA ecosystems with financial

reply software

Walking, talking auto-bots

The application of Robotic Process Automation (RPA) to risk management and regulatory compliance, has the potential to disrupt the Financial Services world. Already, RPA is helping firms to support components of compliance processes in a cost-effective, flexible and timely manner.

to financial institutions. This coupled with a greater demand for

transparency and rigor has brought the role of technology to

Our initiatives span across development of client strategy, world class research, and accelerator and incubator programs. We believe that the first-hand knowledge and experience gained from our initiatives, together with our existing expertise in risk and regulatory matters, our global presence and connection with leading financial institutions, enables us to provide unparalleled services to help business leaders assess

and realize the opportunities created by RPA.

institutions, industry bodies and FinTech/RegTech startups.

Physically existing Machines processing paper

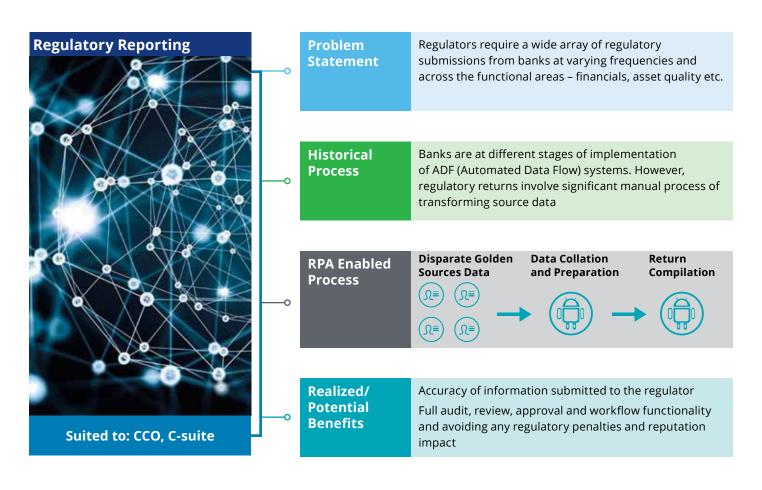
Artificial Intelligence or Voice Recognition and

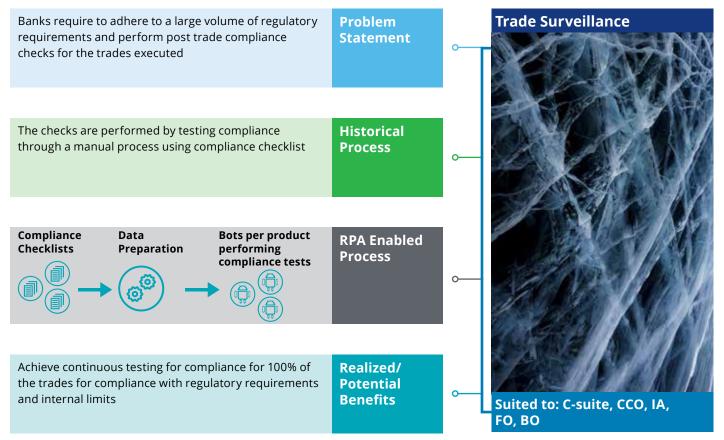
The subsequent pages detail our offerings applying RPA in the areas of risk management and regulatory compliance.



the forefront.

02







Problem Statement Chief Compliance Offficers are required to perform independent testing of compliance to key regulations to be able to certify business units

Historical **Process**

The checks are performed by testing compliance through a manual process using compliance checklists

RPA Enabled Process

Compliance Checklists

Data **Preparation** **Bots for** Compliance







Realized/ **Potential Benefits**

Achieve continuous testing for compliance with regulatory requirements and internal policies

Banks collect an array of documents from their corporate customer to undertake post-sanction monitoring and computation of key financial and risk indicators

Problem Statement

Client data is submitted in disparate formats and computation of ratios is a manual process

Historical

Process

Customer

OCR, Data Collation

Bots for computation of ratios

Data in

RPA Enabled Process





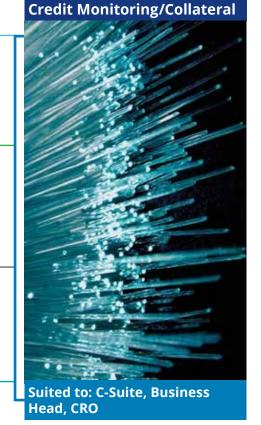




Achieve automation of computation of risk and financial indicators for 100% of the clients

Improved data collection for future risk analysis and model development

Realized/ **Potential** Benefits





Problem Statement The new accounting standard IndAS will require banks to compute ECL every quarter to compute the provisions for the financial statements

Historical **Process**

Manual computation through excel sheets using data dumps from the risk functions

RPA Enabled Process

Data Extracts with PD, LGD

Data Preparation **Bots for ECL** Computation











Retail holesale

Realized/ **Potential** Benefits

Seamless quarterly computation of ECL for reporting of financial statements

Banks need a large number of models for risk quantification and capital computation across risk categories and products

Problem Statement

Annual validation of models. Due to large number of models, not all models get validated every year

Historical

Process

Model Outputs and Actual Outcomes

Data Preparation

Bots for running statistical tests

RPA Enabled Process







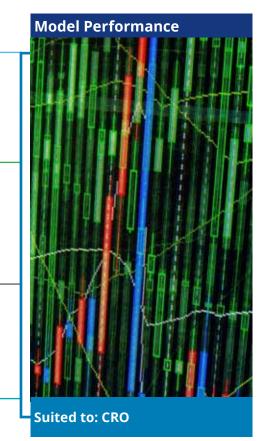




Continuous validation of model outputs, its impact and

model performance

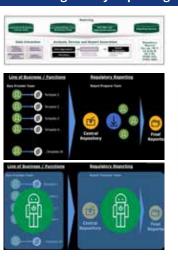
Realized/ **Potential Benefits**





Demos and Point of Views

Demo - Regulatory Reporting











Connectors: Robotic Process Automation

A quick-reference guide to how RCA plays out in global business services, shared services, and outsourcing

Deloitte POV, 2016

Peter Lowes, Frank Cannata, Jason Barkham, Subodh Chitre

Cognitive Technologies: The Real Opportunities for Business

Examines the evolution of cognitive technologies and how it is being used in organizations today

Deloitte Review, 2015

David Schatsky, Craig Muraskin, Ragu Gurumurthy

Redesigning Work in an Era of Cognitive Technologies

Analyzes the impact of disruptive technologies and how new possibilities for work redesign can provide greater value to business and customers

DU Press, 2015

David Schatsky, Jeff Schwartz

Demo - Trade Surveillance









The Robots are Coming

Examines the increasing appetite for robotics leadership and discusses how implementing robotics can improve the Finance functions

Deloitte UK POV, 2015

Richard Horton, Nick Prangnell, David Wright, Dupe Witherick

Show me the Money: Autonomics in Business Process Outsourcing

Examines how autonomics has

the potential to be a disruptor in the outsourcing industry

Deloitte, 2015

Marc Mancher, Simon Tarsh,

Dan Kinsella, Richard Sarkissian

Demo - Compliance Aggregation











Automate This: The Business Leader's Guide to Robotic Process Automation and Intelligent Automation

Explains the basics of enterprise automation using RPA and introduces the capabilities behind Intelligent Automation Deloitte POV 2015

Peter Lowes, Frank Cannata, Subodh Chitre, Jason Barkham

Beyond Automation: Strategies for remaining gainfully employed in the era of very smart machines

Reviews current thinking around automation and suggests businesses look at automation as a form of augmentation Harvard Business Review, 2015

Thomas Davenport, Julia Kirby

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