



# Welcome to the 2018 Persistent Investor Day

December 11, 2018

## **Forward-looking and Cautionary Statements**



Certain statements in this Presentation concerning our future growth prospects are forward-looking statements, which involve a number of risks and uncertainties that could cause actual results to differ materially from those in such forward-looking statements. The risks and uncertainties relating to these statements include, but are not limited to, risks and uncertainties regarding fluctuations in earnings, our ability to manage growth, intense competition in IT services including those factors which may affect our cost advantage, our revenues highly dependent on customers located in the United States, wage increases in India, our ability to attract and retain highly skilled professionals, time and cost overruns on fixed-price, fixed-time frame contracts, client concentration, restrictions on immigration, industry segment concentration, our ability to manage our international operations, reduced demand for technology in our key focus areas, disruptions in telecommunication networks or system failures, our ability to successfully complete and integrate potential acquisitions, liability for damages on our service contracts, concentration of major operations of the Company in one city, withdrawal of governmental fiscal incentives, political instability and regional conflicts, legal restrictions on raising capital or acquiring companies outside India, and unauthorized use of our intellectual property and general economic conditions affecting our industry. The Company may, from time to time, make additional written and oral forward-looking statements, including statements contained in the Company's filings with the Stock Exchanges and our reports to shareholders. The Company does not undertake to update any forward-looking statements that may be made from time to time by or on behalf of the Company.

## First time in Mumbai ...



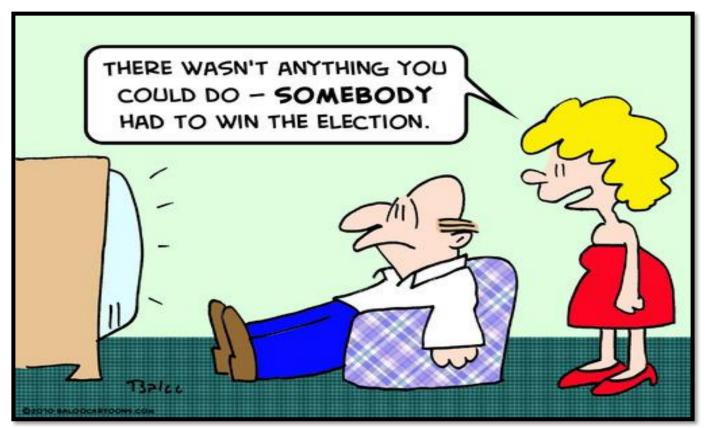


TOGETHERNESS

please share your feedback!

## Sorry, we missed that today is election results day ...





## Persistent at a Glance





### Product Development

Enabling those in the business of software and those building software driven business

### **Technologies**

Al, Machine Learning & Data Cloud Services Identity, Access & Security Internet of Things





#### Industries

Banking, Financial Services & Insurance
Healthcare & Life Sciences
Industrial Manufacturing
Software & Technology

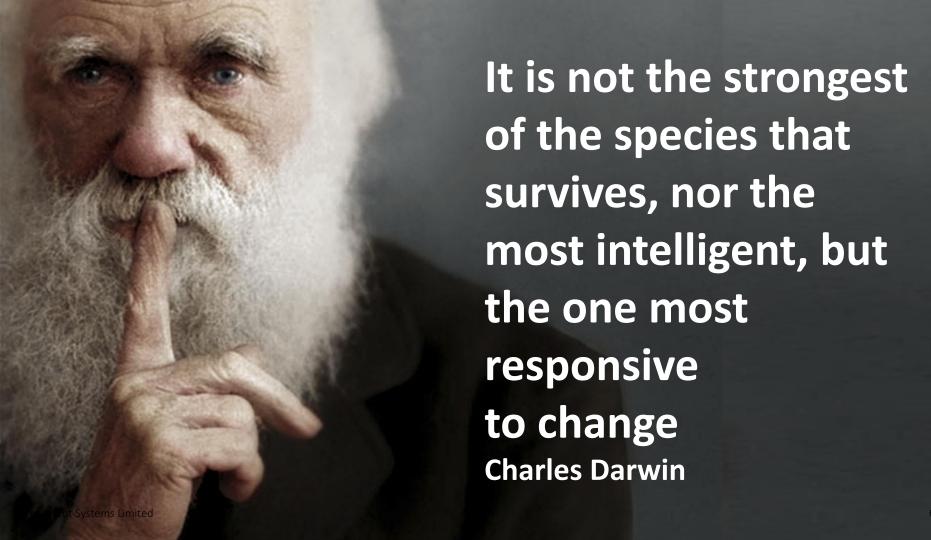
**\$470.55M** FY'18 revenues

9000+ employees

**15+** countries



Software 4.0: Playbook for building Software Driven Products and Businesses









## Four Iyes

- .. Integration of data and events
- 2. Incremental and iterative development
- 3. Insights that are actionable
- 4. Intelligence embedded in applications



Integration – APIs are driving the economy



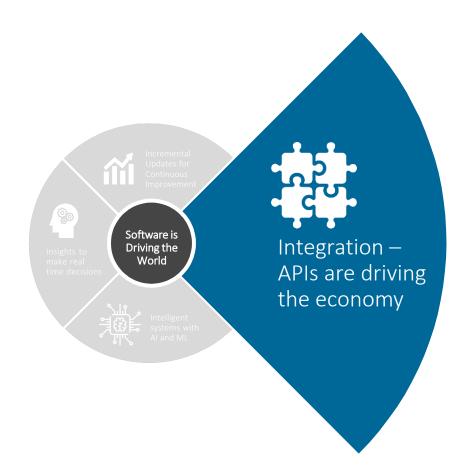












## We are moving from the Internet of People to the Internet of Things

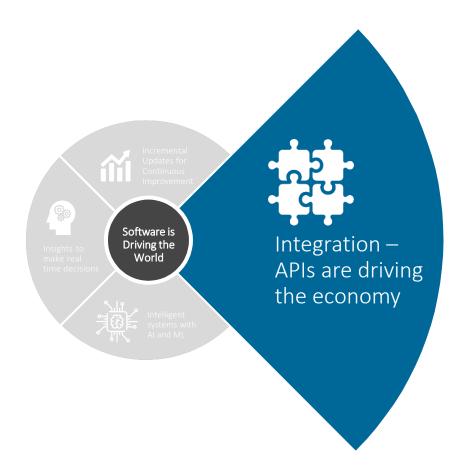


212 BILLION

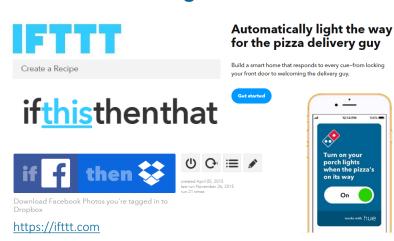
Total number of available sensor enabled objects by 2020

212B is **28x** the total population of the world

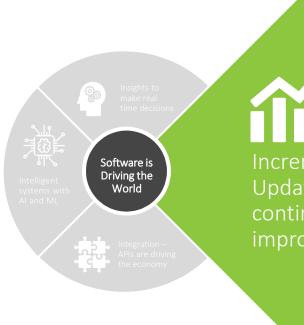




## Task centric experiences: integrating data and events breaking silos

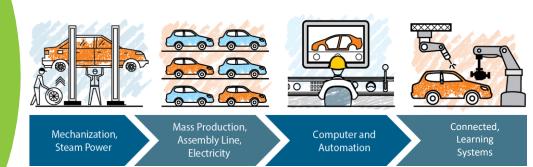




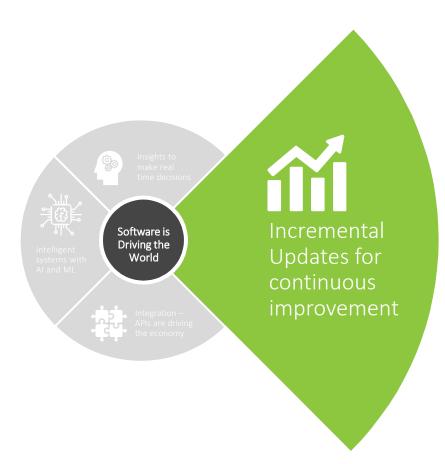




## Continuous Engineering and Connected Products is driving Industry 4.0







## Upgrading the business with a software update

PARTNER CONTENT ALEX BRISBOURNE, KORE

## TESLA'S OVER-THE-AIR FIX: BEST EXAMPLE YET OF THE INTERNET OF THINGS?



Image: jurvetson/Flickr

http://bgr.com/2016/01/09/tesla-model-s-softwareupdate-7-1-summon/



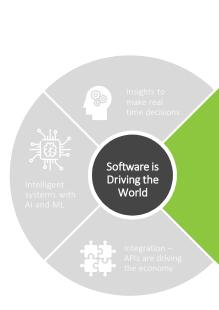
Tesla earlier today began pushing out version 7.1 of its software to Model S and Model X owners and, suffice it to say, it's a doozy of a software update.

While we'll get to the full changelog shortly, we first wanted to highlight a feature called Summon which enables users to park their cars without having to be inside it. Conversely, it also lets Tesla owners summon their cars that already happen to be parked.

Tesla Model S' new 'Summon' feature lets drivers park and retrieve their cars with no one inside

By Yoni Heisler on Jan 9, 2016 at 3:00 PM

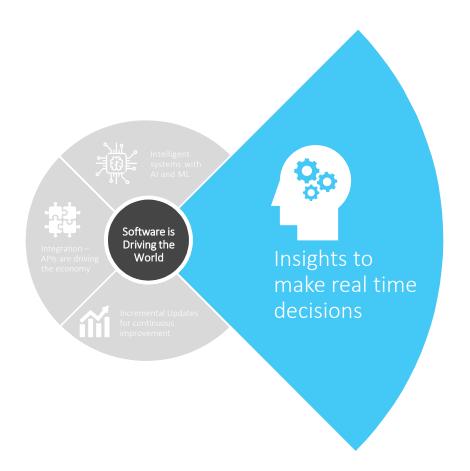






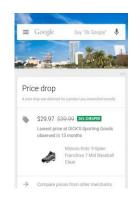






## Moving from dashboards to actionable insights

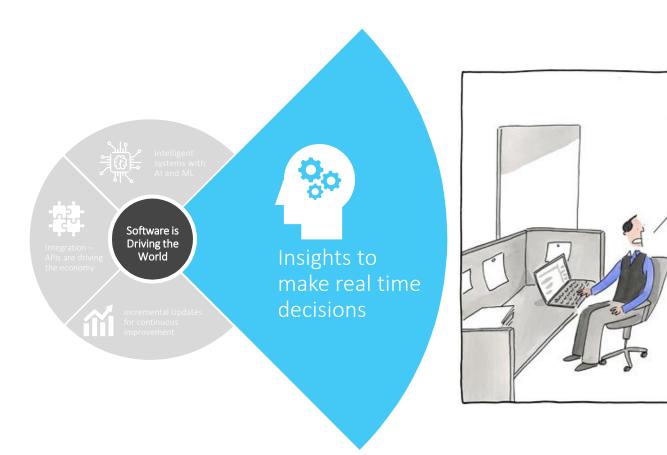






From Pull to Push



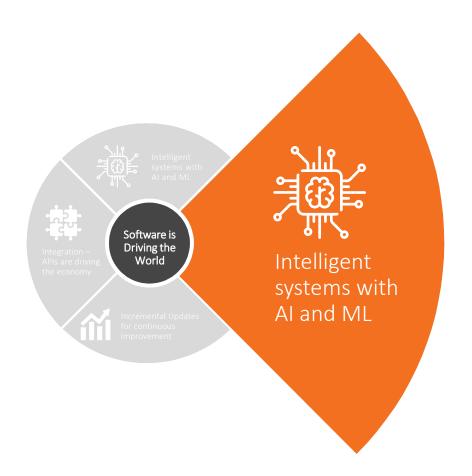


ITHINK MY NEST SMOKE
ALARM IS GOING OFF.
GOOGLE ADWORDS JUST
PITCHED ME A FIRE
EXTINGUISHER AND AN OFFER
FOR TEMPORARY HOUSING.



@ marketoonist.com





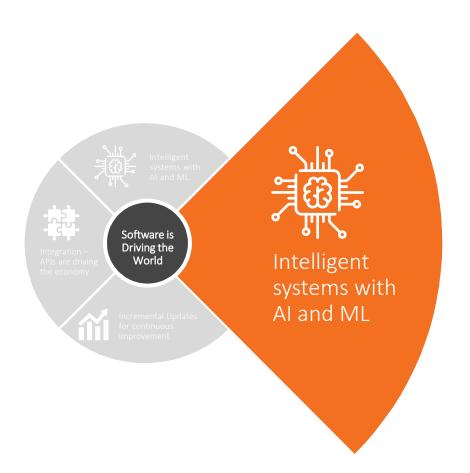
## Putting intelligence to work: Which project will need attention next week?











### Putting intelligence to work: Which movie you would like to watch next?

#### **Everything is a Recommendation**



Over 75% of what people watch comes from our recommendations

Recommendations are driven by **Machine Learning** 

NETFLIX













## Software 4.0

Our methodology for Navigating Technology and Business Shifts

**Design** for Autonomy and Interdependence Discover Optimize Define **Continuous** Continuous Personalization Optimization and and Value of Automation Experience Develop Operate Deliver

Iterative and Incremental by **Design** 





Are we ready for the AI driven precision healthcare revolution?

August 23, 2018



An Ideal ML Candidate Should Have Knowledge Of Data & Cloud Systems, Says Sameer Dixit Of Persistent Systems

June 15, 2018



Machine learning beyond the algorithm

May 30, 2018

## the quint

Do Hackathons Fulfill Their Agenda of Problem Solving in India?

May 7, 2018

## HEALTHCARE Analytics News.

Patient 360: Bringing Disparate Information into One View

August 22, 2018



Decoding Blockchain for the Government

January 22, 2018

### **Business Standard**

Persistent Systems unveils Machine Learning models on AWS Marketplace

November 29, 2018

How TRAI intends to use blockchain to tackle spam

August 30, 2018

#### hindustantimes

"We will continue to work with the Pune police and help them serve residents better"

April 17, 2018

#### hindustantimes

Cops dial in a smart digital response

April 17, 2018

### Healthworld

Mobile technology crucial for improving doctor-patient engagement: Sudhir Kulkarni, Persistent Systems

March 8 2018

#### THE TIMES OF INDIA BUSINESS

Persistent Systems acquires Herald Health

September 5, 2018

#### **HealthLeaders**

Partners HealthCare Teams with Persistent Systems to Scale Innovations

October 18, 2018

#### **HOSPITAL REVIEW**

Partners HealthCare and Persistent Systems open center of excellence for preventive care, chronic care

October 23, 2018

### **Forbes** Technology

Four principles for success with Digital Health

February 23, 2018

Start?

### EXPRESS

Picking The Right Bot Platform - Where To

August 17, 2018

Open Standards And Health Care Transformation: It's Finally Delivering On The Value It Promised

**Forbes** 

October 25, 2018

### **Forbes**

Reimagining Indian IT

May 14, 2018

#### THE ECONOMIC TIMES

Bots Rising: IT firms keep count and report too

May 25, 2018



Persistent Systems brings Digital Transformation to Clinical Care with Partners Healthcare

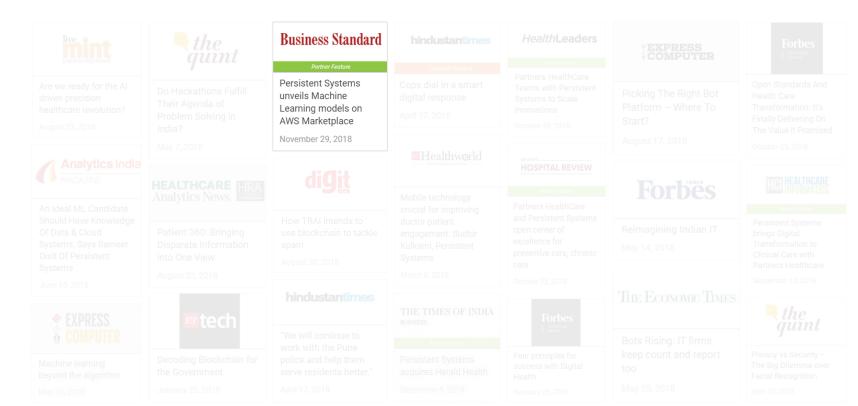
September 18, 2018



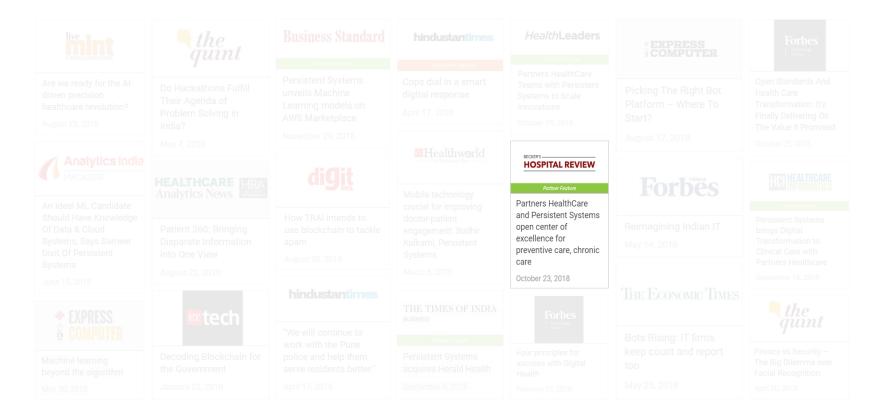
Privacy vs Security -The Big Dilemma over Facial Recognition

April 20, 2018

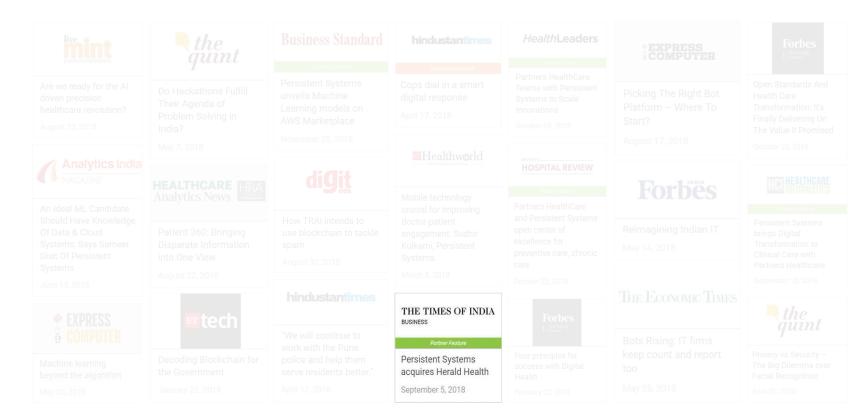
















Mambu – A leading cloud banking engine launching next generation of financial services



REIWA Employs CRM solution used by all stakeholders



Peacock Engineering Transforms Industrial Asset Management with Persistent Systems and IBM



Find out how USAA works with Persistent to bring greater and smarter security to their members



Persistent teams with India's National Center for Radio Astrophysics to develop



How an e-mobility and renewable energy company is using Salesforce and Persistent to get a 360° view of their customers



Persistent Systems talks with Rajiv Dholakia and Ramesh Kesanupalli of Nok Nok Labs on how they are reinventing security for the digital ecosystem



A VC firm leverages the power of Agile and Persistent to turn an idea into a product and bring it to market, fast!



Becoming software driven with low-code! Persistent and OutSystems show how



Acting local, thinking global – How the Internet of Things is transforming our neighborhoods for a better world with Three Phase Electric



Shyam Namashivayam, Head of Intelligent Process Automation at NetApp on the power of Hackathons



Persistent Systems talks with Margaret Coughlin, SVP and CMO at Mount Sinai Health System on how AI is helping Mount Sinai predict the needs of the patient and deliver customized patient experience



Augmenting employee performance with RPA and Machine Learning



Find out how Emerson, a \$22B global manufacturing leader, is using Agile methodology to bring software driven solutions to market



Richard Knaster, Scaled Agile discusses what's needed to become a truly Agile organization





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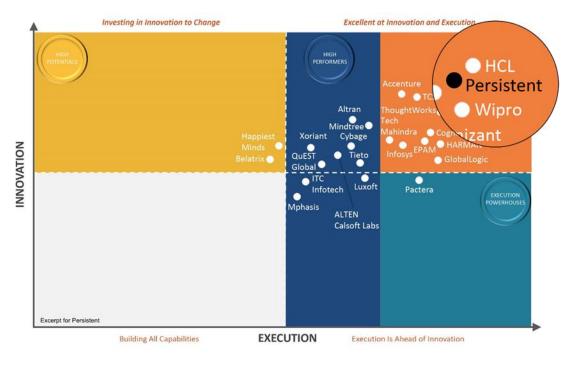
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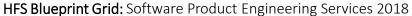


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## Recognized as a Leader by Analyst Firms









Winner's Circle of the HFS Blueprint Report for Software Product Engineering Services

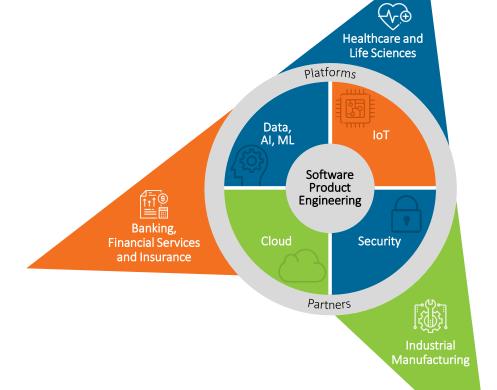


Digital
Product Engineering
Internet of Things

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## **Our drivers for Growth**









## Agenda for today

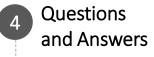
## Agenda for the day



Digital & AI fueling transformation across bench to bedside

Is ML ready for prime time?

Software Driven
Responsiveness
for Banking and
Financial Services



12:15 PM - 1:00 PM

#### **Panellists**

Anand Deshpande

Sunil Sapre

Rahul Patel

Jaideep Dhok

Mukund Deshpande

9:50 AM - 10:30 AM

#### Moderator

Rahul Patel

#### **Panellists**

Bradford Diephuis

Shreekanth Joshi

Nilesh Shringarpure

#### **Partner Speak**

Dr. Howard Federoff Ex-Vice Chancellor for Health Affairs CEO, UC Irvine Health System

Dr. Calum MacRae Vice Chair for Scientific Innovation, Department of Medicine at Brigham and Women's Hospital and Harvard Medical School 10:45 AM – 11:25 AM

#### Moderator

Rakesh Rathod

#### **Panellists**

Pari Natarajan CEO at Zinnov LLC

Mukund Deshpande

Rashmi Tambe

#### **Customer Speak**

Milind Bhandarkar Founder, CTO, Ampool, Inc. 11:30 AM - 12:10 PM

#### Moderator

Jaideep Dhok

#### **Panellists**

Venkataraman S V Managing Director at ANZ

Padma Shri Prof D B Phatak

Ray Bharadwaj

#### Partner Speak

Myles Bertrand Managing Director APAC, Mambu

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# Healthcare and Life Sciences

Personalized. Precise. Connected.

## **Focused on digital healthcare**



#### **Precision Clinical Systems**

- Algorithm driven clinical pathways
- Precise patient stratification
- Data return cycle to create learning health system



#### Translational Research Acceleration

- Integrated analytics across multi-omics & clinical patient data
- Al driven insights and ML-



#### Patient Engagement



### **Hospital Operations** Optimization

- Personalized, real-time notifications for resource optimization
- Improved coordination and collaboration across the health system



#### Patient Data Access and Integration

- Data Lake & Warehouses
- Al & Machine Learning

- Standards-based API
- Patient Data Model

- Ontologies
- Security





HERALD HEALTH





## Offering Across the Spectrum for Life Sciences Companies



#### Software Design & Development

Assay design,
Instrument Control,
Downstream Analytics
Software for Genomics,
Analytical Instruments and
Medical Devices

### **Data Driven Insights** Clinical and <u>{</u> Translational Research Solutions Instrumentation Sample Management Sample Management and Storage (Cirraspec), and Omics Laboratory information management (ChemLMS) **Expertise**

#### Accelerating Time to Market

Regulatory & Compliance Services for regulatory approvals (FDA)

qPCR, Microarray's, Sanger sequencing, NGS, Mass spectrometry, LC, GC (Omics)



## Digital & AI fueling transformation across bench to bedside



### Moderator



Rahul Patel

### **Panellists**



Bradford Diephuis



Shreekanth Joshi



Nilesh Shringarpure

### Partner Speak



Dr. Howard Federoff Ex-Vice Chancellor for Health Affairs CEO, UC Irvine Health System



Dr. Calum MacRae Vice Chair for Scientific Innovation, Department of Medicine at Brigham and Women's Hospital and Harvard Medical School





# AI, ML, and Data

The Engine and Fuel of a Software Driven Business

## Offerings – AI, Machine Learning, and Data



#### Influence Areas

- Data Strategy
- Data Lake
- Data Monetization
- Machine Learning
- Cloud Analytics



#### **Product Engineering**

- Data Integration
- Database Development
- Refactoring and Redesigning
- Certification Labs
- Owned IP
- Open Source Contributions

#### **IP and Accelerators**

- ShareInsights
- Connector Factory
- Hadoop and Spark Deployment
- Marketing Automation
- AWS ML Marketplace Models
- Intelligent Document Processing



#### Service Areas

- Big Data Development and DevOps
- Analytics and BI
- ML Workshops
- Custom Solutions



#### Domains

- Banking, Financial Services, and Insurance
- Life Sciences
- Healthcare
- Telecom

- Hitech
- Technology
- Media
- Retail









 $C \wedge Z E \wedge A$ 









## Solutions - AI, Machine Learning, and Data





Powerful self-service analytics platform for faster time to insights



Self-service interface that goes across the analytics spectrum to include data discovery, data pipeline, data preparation, and machine learning.



Interactive, metadata-based designer with a drag-and-drop interface to create data pipelines. Use programming or SQL only if you need to.



Self-service analytics tool that helps you break the shackles and independently reshape data, run hypotheses, drill down, and find patterns through built-in connectors.



Highly intuitive interface to move seamlessly between data and visualization.

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## Is ML ready for prime time?



### Moderator



Rakesh Rathod

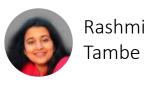
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Pari Natarajan CEO at Zinnov LLC



Mukund Deshpande



**Customer Speak** 



Milind Bhandarkar Founder, CTO, Ampool, Inc.





# Banking, Financial Services, and Insurance

**Software Driven Responsiveness** 

## **Software Driven Responsiveness for Banks**



## Traditional Responsiveness

- Product-centric approach
- Indifferent customer experience
- Branch-based banking
- Reactive risk response model; confined within regulatory framework
- Labor intensive operations and scalability
- Partner ecosystems

## Software Driven Continuous Transformation



FinTech Disruptions



**Enhanced Regulations** 





**New Age Customer Needs** 

## Software Driven Responsiveness

- Client-centric approach
- Extreme personalization
- Digital-first, digital-only experience
- Imperceptible, contextdriven regulatory compliance
- Automated and effective ops for staff responsiveness
- Marketplace ecosystem

## Enabling new age digital banks and bringing technology led efficiency



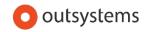
#### **Digital Banking Enablement**

- Digital customer acquisition and retention
- Digital, digital-first, and digital-only customer experience journeys
- Customer centric product launches
- Digital lending and loan lifecycle management
- Banking as a Service enablement











- Digital customer onboarding
- Digital products configuration and management
- Cognitive back office operations automation
- Context driven risks and fraud management
- Digital contact center solutions
- Inter-bank connectivity for financial data sharing





**blue**prism



## Software Driven Responsiveness for Banking and Financial Services



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## Thank you



## **Questions and Answers**



### **Panellists**



Anand Deshpande



Rahul Patel



Mukund Deshpande



Sunil Sapre



Jaideep Dhok