Impact and results of AI in different industries

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AI is predicted to become a major factor in global GDP growth by 2030

Global GDP Impact of AI through 2030

Y-axis: Global GDP uplift due to AI ($ in trillions)

X-axis: 2016 2017 2018 2019 2020 2021 2022 2023 2024 2025 2026 2027 2028 2029 2030

■ Productivity ■ Consumption
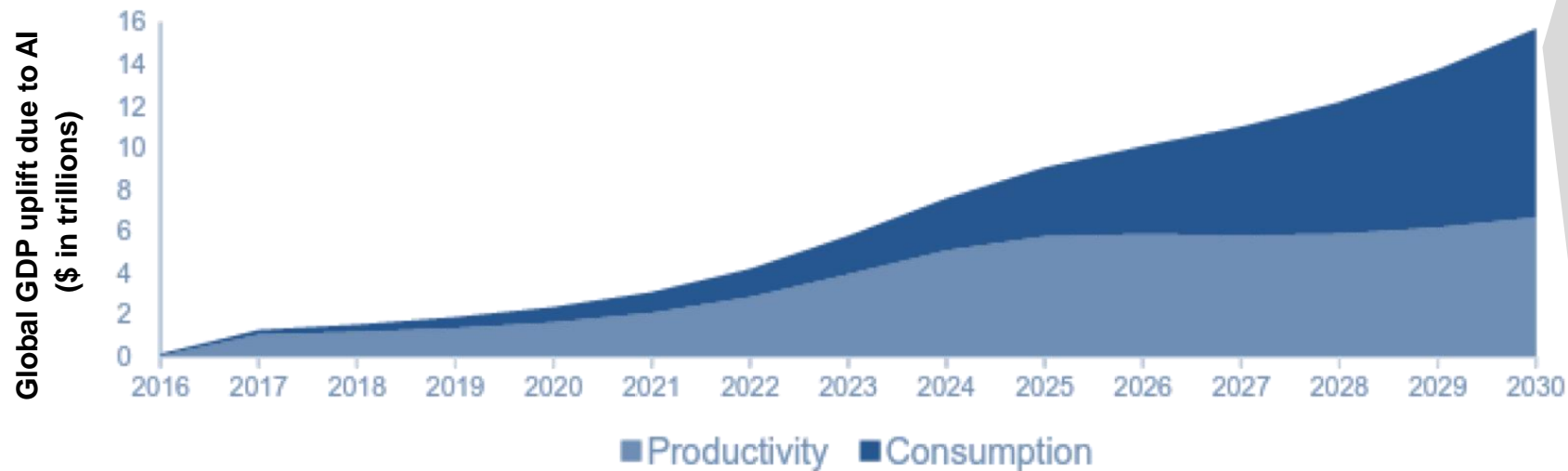
2030 IMPACT: $15.7T

Consumption Contribution: **60%**

Productivity Contribution: **40%**

Executives had ambitious plans for AI in 2019: 20% said their companies will roll it out across the business in this year
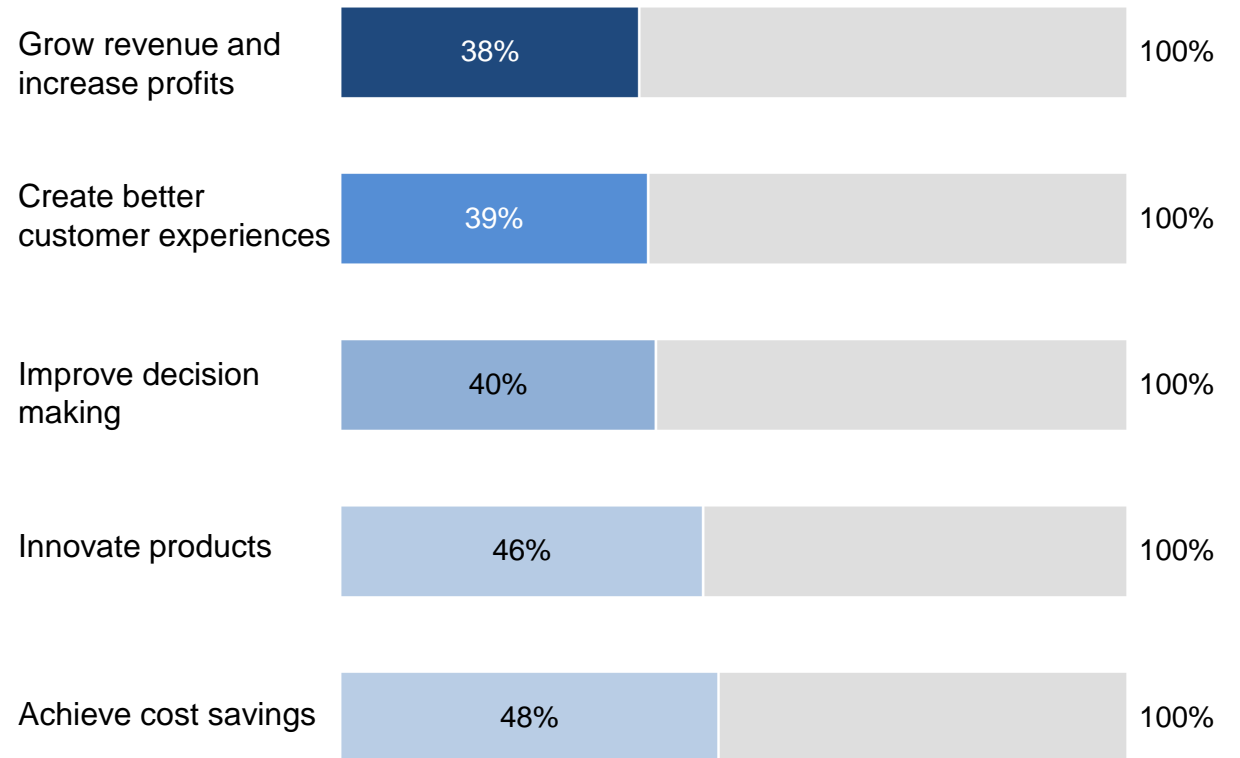
AI at scale?
How far along companies will be in 2019

22%	Plan to deploy AI enterprise-wide
16%	Already implemented AI in multiple areas
15%	Plan to deploy AI in multiple areas
27%	Implemented pilot projects within discrete areas
20%	Investigating use of AI
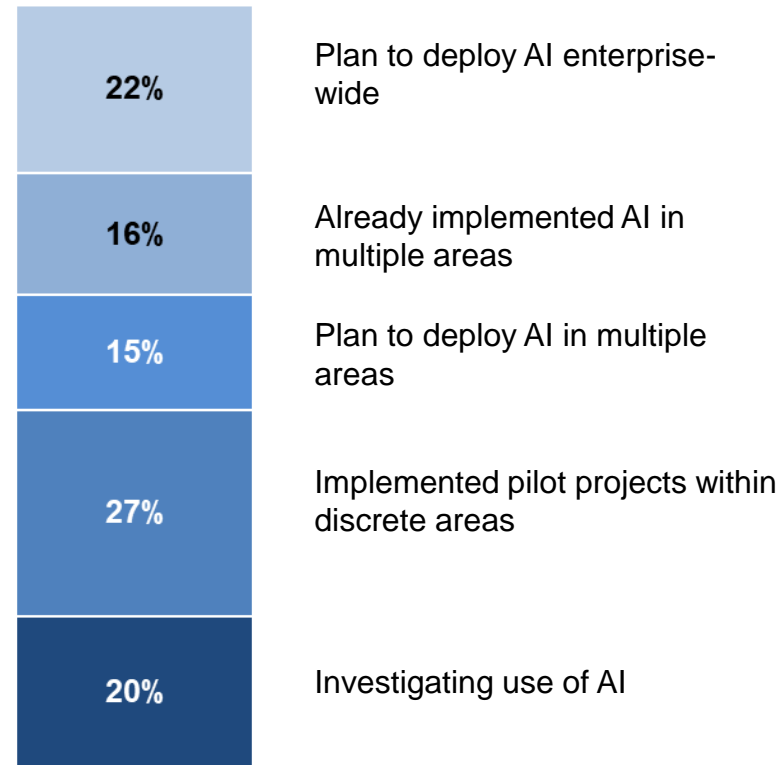
Source: PwC 2019 AI Predictions
Base: 633
Q: How far along is your organization with AI, select 1

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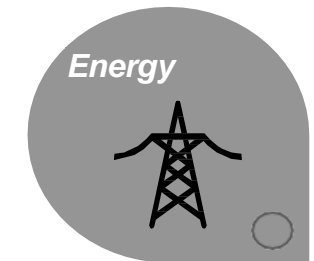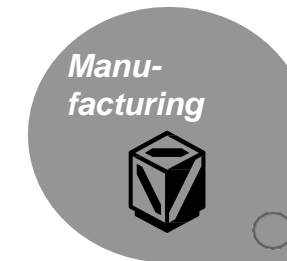# AI can help businesses create and market high-quality, personalized, data-driven products and services.

Monetize AI?
What is the perceived value of AI investments.

Grow revenue and increase profits	38%	100%
Create better customer experiences	39%	100%
Improve decision making	40%	100%
Innovate products	46%	100%
Achieve cost savings	48%	100%

Source: PwC 2019 AI Predictions
Base: 1,001
Q: What value do you expect from your AI investments?

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Healthcare, Auto, and Financial Services will be especially susceptible to AI disruption

Healthcare, Auto, and FS exhibit large potential for *high touch, high frequency, and high value* products & services enabled by AI

Healthcare

Auto

FS

Retail

Transport & Logistics

Tech, Media, Comm.

Manu-facturing

Energy

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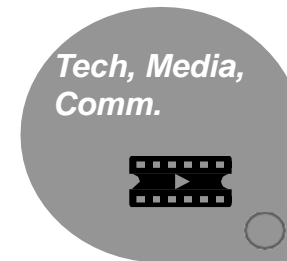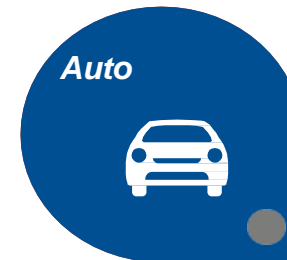
Japanese Mutual insurance company is automating business processes to reduce labour

Robotic Process Automation (RPA) Capabilities

Document Image Capture

OCR functionality with the ability to identify specific fields and words

Data entry

Automated data entry and transfer across disparate systems

Rules-Based Triggers

Automatically initiate repeatable tasks

Data scrapping

Scrape from live web pages and documents based on key words

*RPA vendor solutions are **dominating the market** for automating processes but have **limitations** on the extent and scope of impact they can have*

Main benefits realised through the project

+30%
increase in labour productivity

$2M
annual savings
*at $150K maintenance

3x
benefit over offshoring

110-140M
reduction in workers by 2025

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A Global Pharmaceutical company used Natural Language Processing to extract adverse drug interaction from multiple unstructured data sources

Sources

Clinician notes

Social media

Medical literature

Process

1 Tokenization Grammar Parsing Text Normalization Text Cleaning Word Disambiguation Vectorization

2 Gathering key information output, e.g., patient *sneezes* (event)

3 Deep Learning of Latent Relationships, e.g., *sneezing* and *antihistamine*

Main benefits realised through the project

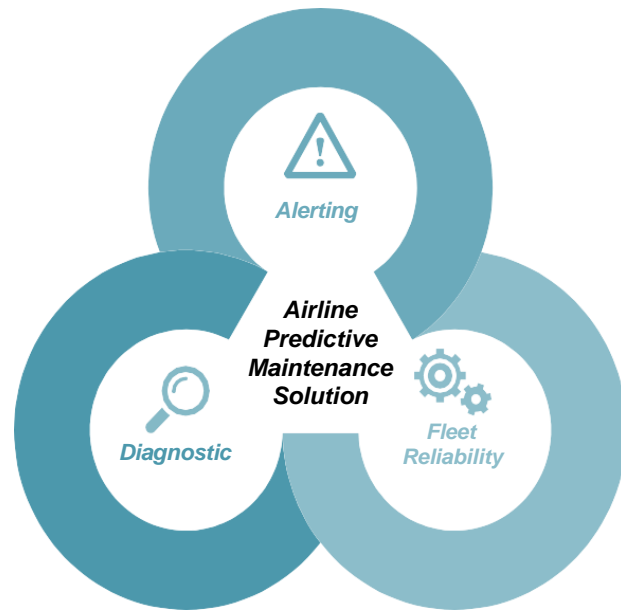| +20%	96%	35% - 45%	$14-18 M
Annual growth of adverse events	Diagnostic accuracy	Savings in processing costs	Annual savings on current base

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Global airline used predictive aircraft maintenance to reduce maintenance related costs

Alerting

Airline Predictive Maintenance Solution

Diagnostic

Fleet Reliability

Provides maintenance controllers **indication of potential failures at the aircraft component level** that necessarily result in delays and cancellations (D&Cs) 2-5 days out enabling maintenance intervention

Enables reliability engineers to **monitor fleet health** and identify trends, chronic aircraft and parts

Provides airline clients a deep **analysis on aircraft fault messages** and **text analytics** on maintenance logs to find significant signals that cause delay and cancellation events

Main benefits realised through the project

15%
reduction in delays due to maintenance

+0.9%
on time performance

-$25M
Cost reduction

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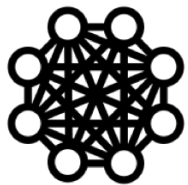# Global auto manufacturer gamified its strategy to evaluate go-to-market scenarios
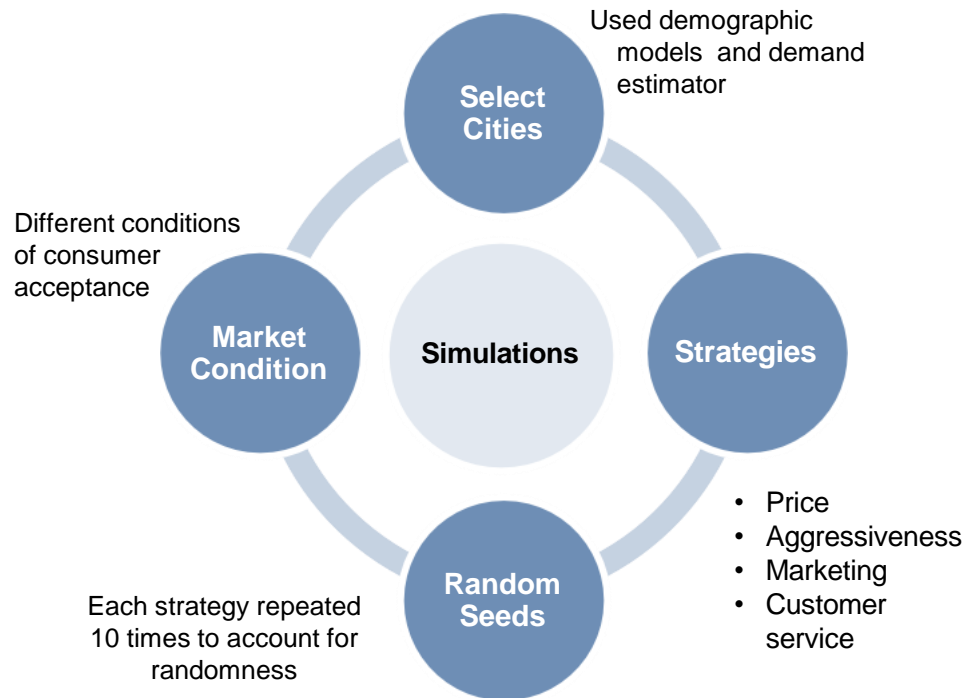
Digital Twins of consumers…

Socio-demographics

Transport choice (commute, errand, weekend)

City topology

…were modelled under a set of **scenarios**

Used demographic models and demand estimator

Select Cities

Different conditions of consumer acceptance

Market Condition

Simulations

Strategies

- Price
- Aggressiveness
- Marketing
- Customer service

Each strategy repeated 10 times to account for randomness

Random Seeds

Main benefits realised through the project
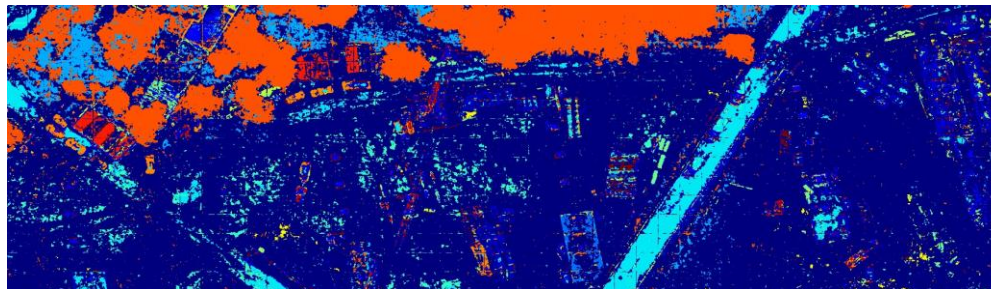
200,000
go-to-market scenarios evaluated

$1+ bn
Acquisition of AV technology start-up

170 M
Miles delivered by 10,000 vehicles

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Construction company used drones and deep learning to monitor construction site progress

*From a **drone aerial picture** company was able to produce **segmented output** of different objects in that image*

Key:

▪ Background	▪ Trees
▪ Cars	▪ Concrete
▪ Asphalt	▪ Reinforcement

Main benefits realised through the project

60%	700	$3M
reduction in operational cost	hours of labor savings on one project	annual savings on a $5M project

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To become an AI leader and realize clear benefits, make this your priority list

1. Build your AI foundation

↓

Set your AI strategy and build the capabilities so you start strong and are well-positioned to scale.

2. Create an AI-ready workforce

↓

Reimagine your HR strategy for the AI age, from upskilling and recruiting to creating the right culture for collaboration.

3. Make your AI trustworthy

↓

Develop responsible AI with security, explainability, model validation, auditing, and regulatory alignment.

4. Turn data into value with AI

↓

Enhance analytics with AI to improve processes, predict problems, and create new revenue.

5. Use AI to drive business strategy

↓

Develop business modeling scenarios, inform product development, and more.

6. Create a smart AI ecosystem

↓

Embed AI into the IoT and other tech to boost productivity and cost savings.

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Konferenca GoDigital 2019

Thank you for your attention!

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