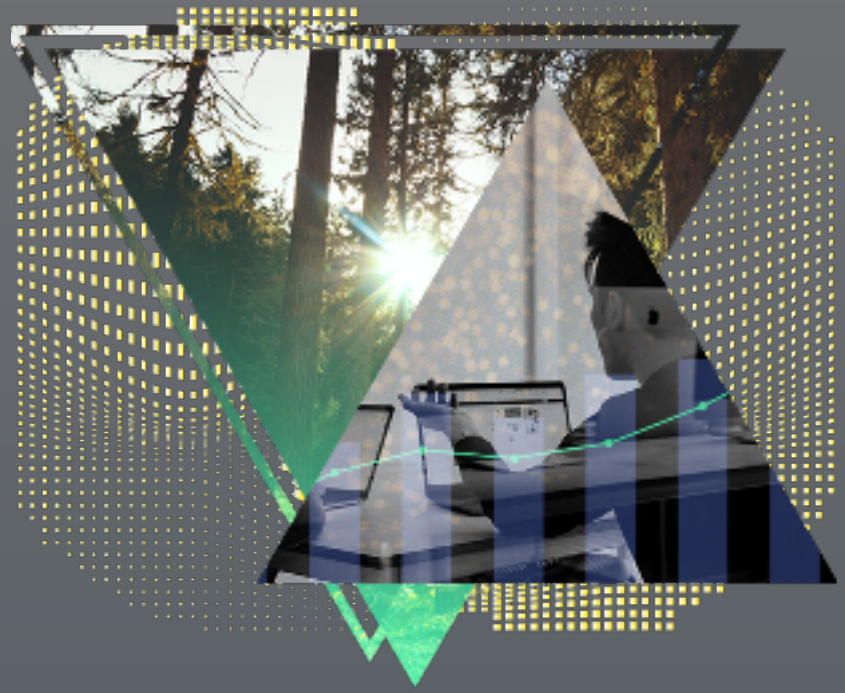
FORRESTER®

Graph and AI Can Help Accelerate Your Digital Transformation Strategy

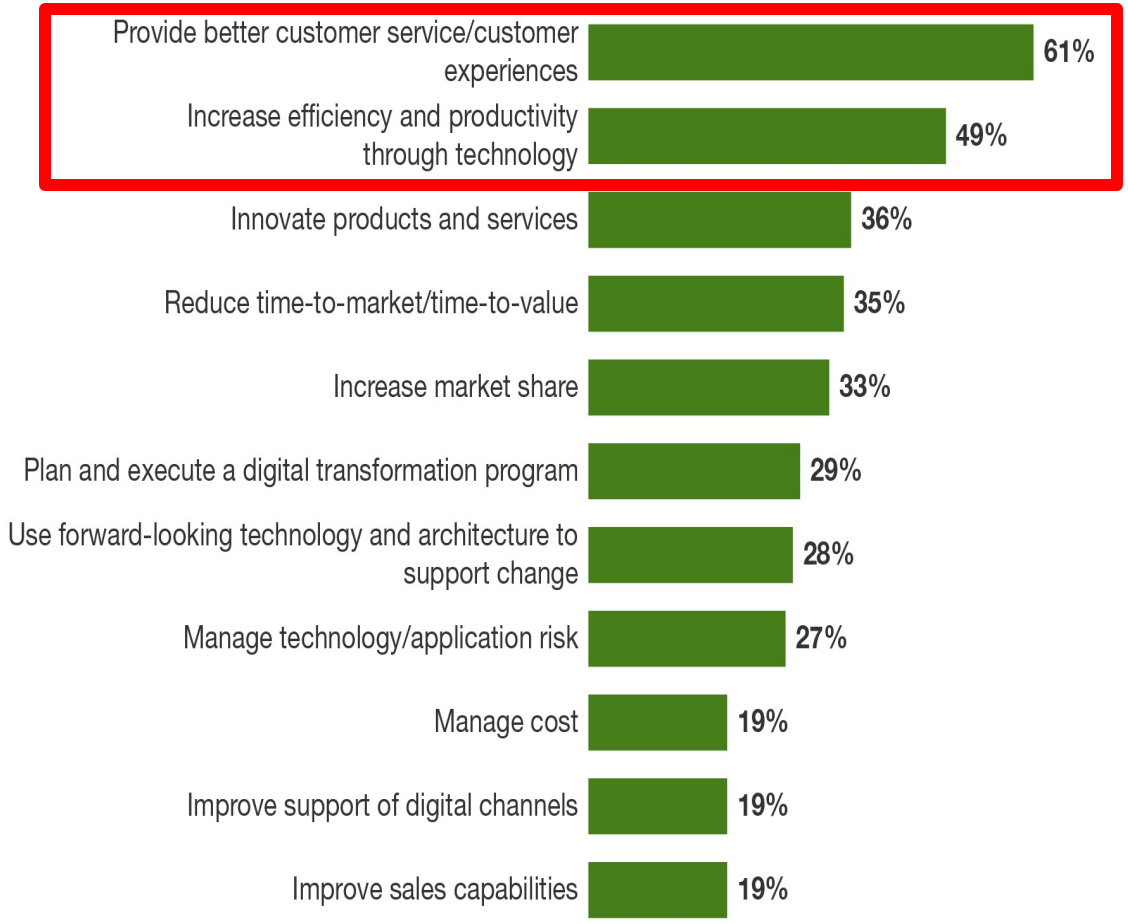


Noel Yuhanna

Vice President, Principal Analyst

Digital transformation continues to be a top priority for global enterprises . . .

"What are the top business requirements driving your company's digital transformation needs?"
(Top 11 responses only)



Base: 101 global financial services professionals
Source: Forrester's Q3 2019 Global Financial Services Architecture Survey

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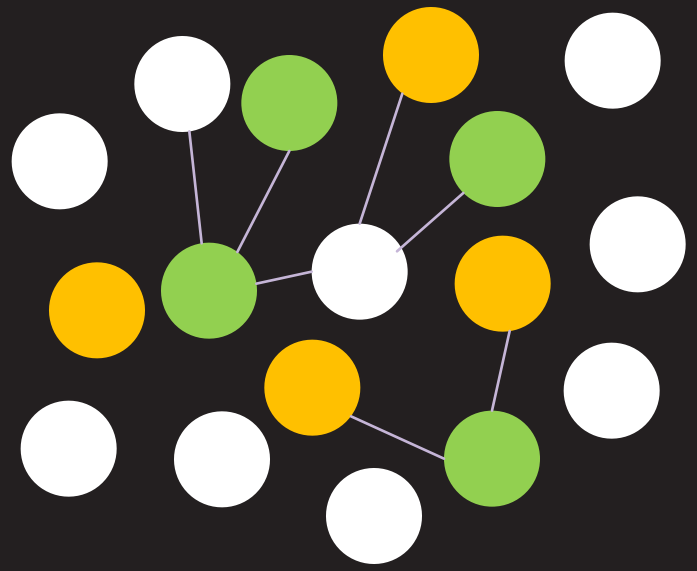
Customer experience and operational efficiency are top drivers of digital transformation.

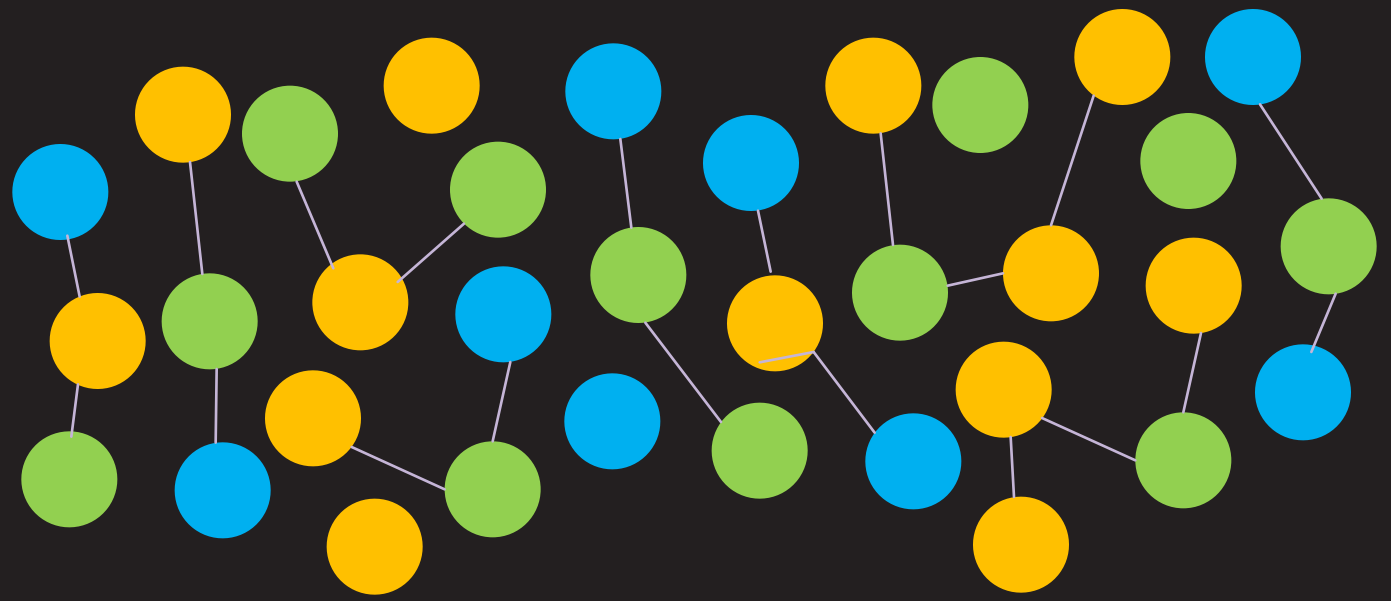
Digital transformations must be powered by new generation solutions to remain competitive …



Creating data connections can be very complex and time consuming!

Ingest

Data sources



Graph simplifies data connections at scale

Ingest

Data sources

Customer transaction data

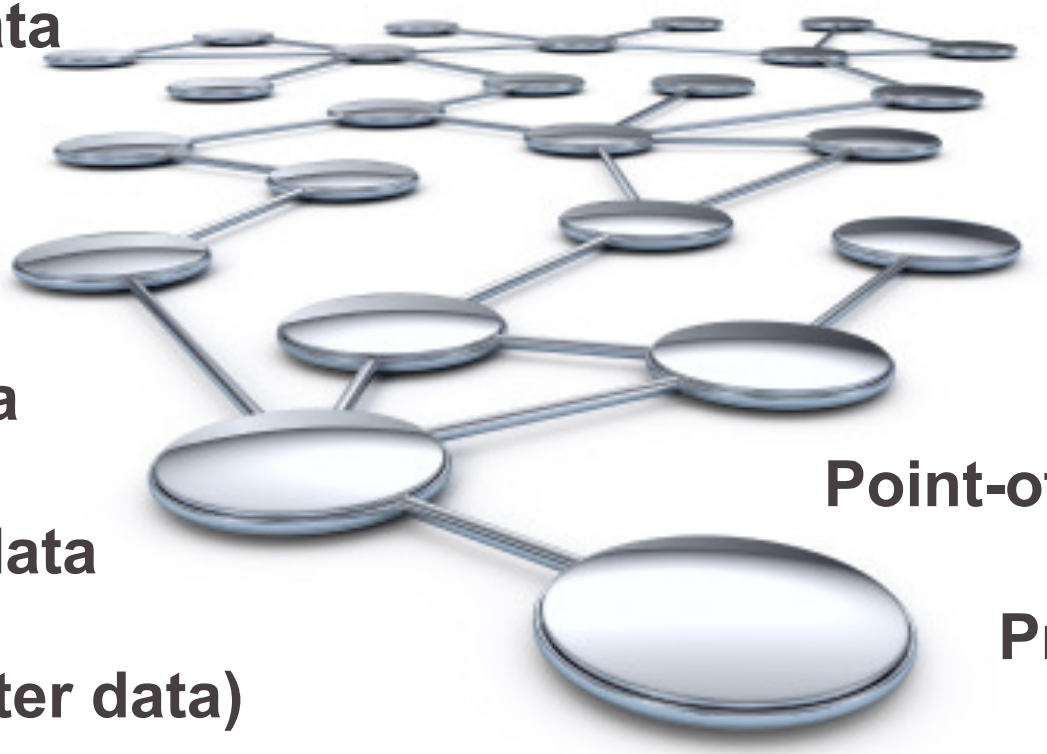
Social data

Supply chain data

Click-stream data

Inventory data

System of record(master data)



Customer data

ERP data

Sales data

Sensor data

Point-of-sale data

Product data

Graph delivers contextualization to support new digital transformation initiatives…

Why use Graph Database?

- **Make connections quickly and more accurately:** For new and emerging business use cases
- **Data analysis performance**: Takes query, insights and predictive analytics to the next level
- **Uncover hidden connections**: In data science, and advanced analytics
- **Improve staff productivity**: With minimal coding and more analysis
- **Address new business needs:** Integrates with AI/ML to deliver new business use cases.

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The top benefits of **Graph** are aligned with the top business requirements of digital transformations.

- **Improve customer experience**.
- Increase automation of internal processes.
- Improve operational efficiency and effectiveness.
- Increase employee productivity.
- Improve existing products and services.

Note: Top five responses are shown. “Don’t know,” “other,” “none of these, and “we are not using artificial intelligence (AI) technologies” responses were excluded.
Base: 3,139 data and analytics decision makers whose firm is interested in using/planning to use/currently using AI; Source: Forrester Analytics Global Business Technographics® Data And Analytics Survey, 2019

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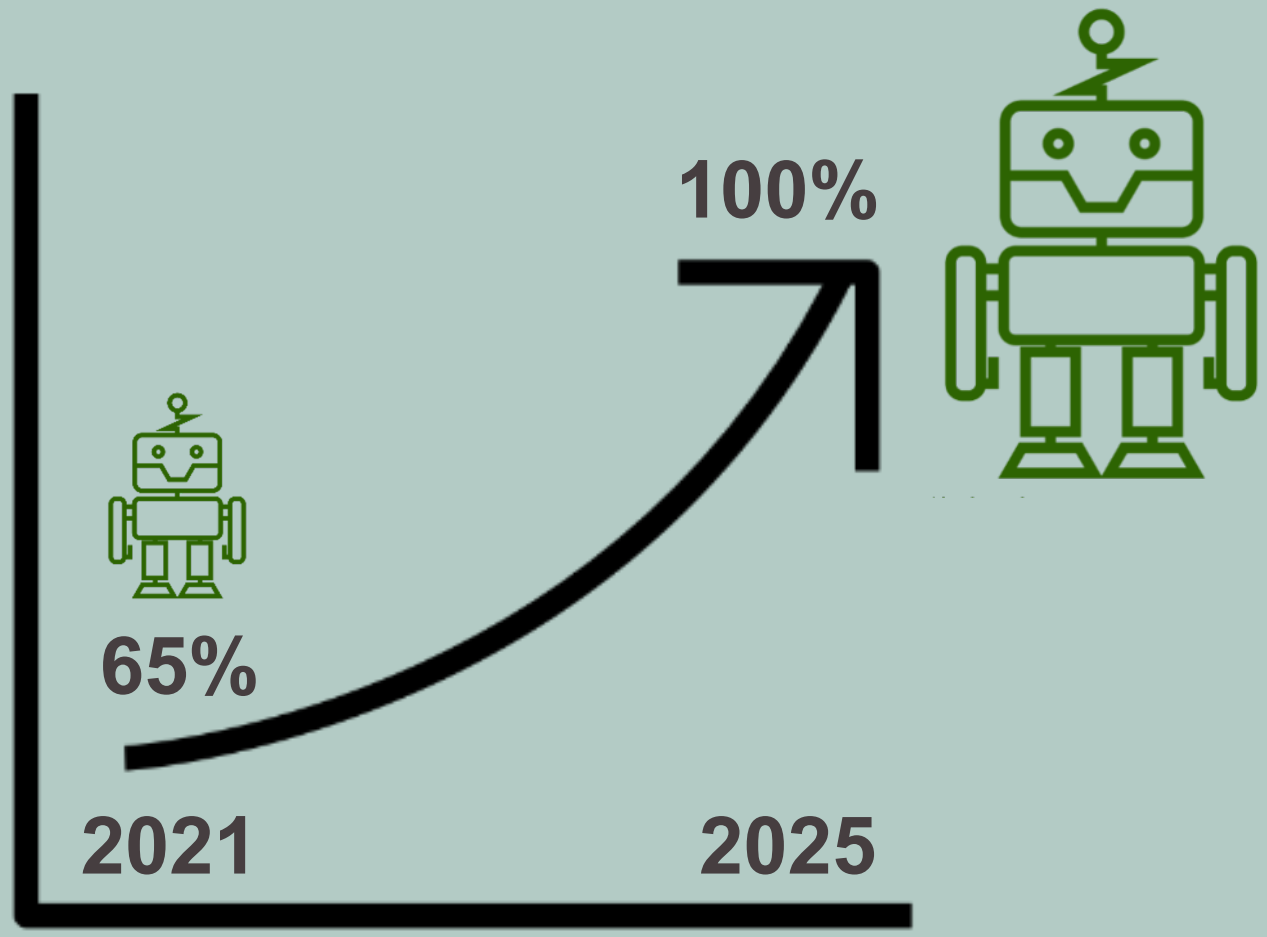
AI is real and ready … organizations are
leveraging it for all kind of use cases…

. . . enterprises use it today to create millions in value even with single use cases.

. . . there are five, 50, 500, and 5,000 enterprise use cases yet to be implemented with AI.



We estimate that nearly 100% of enterprises will use AI within the next four years . . .

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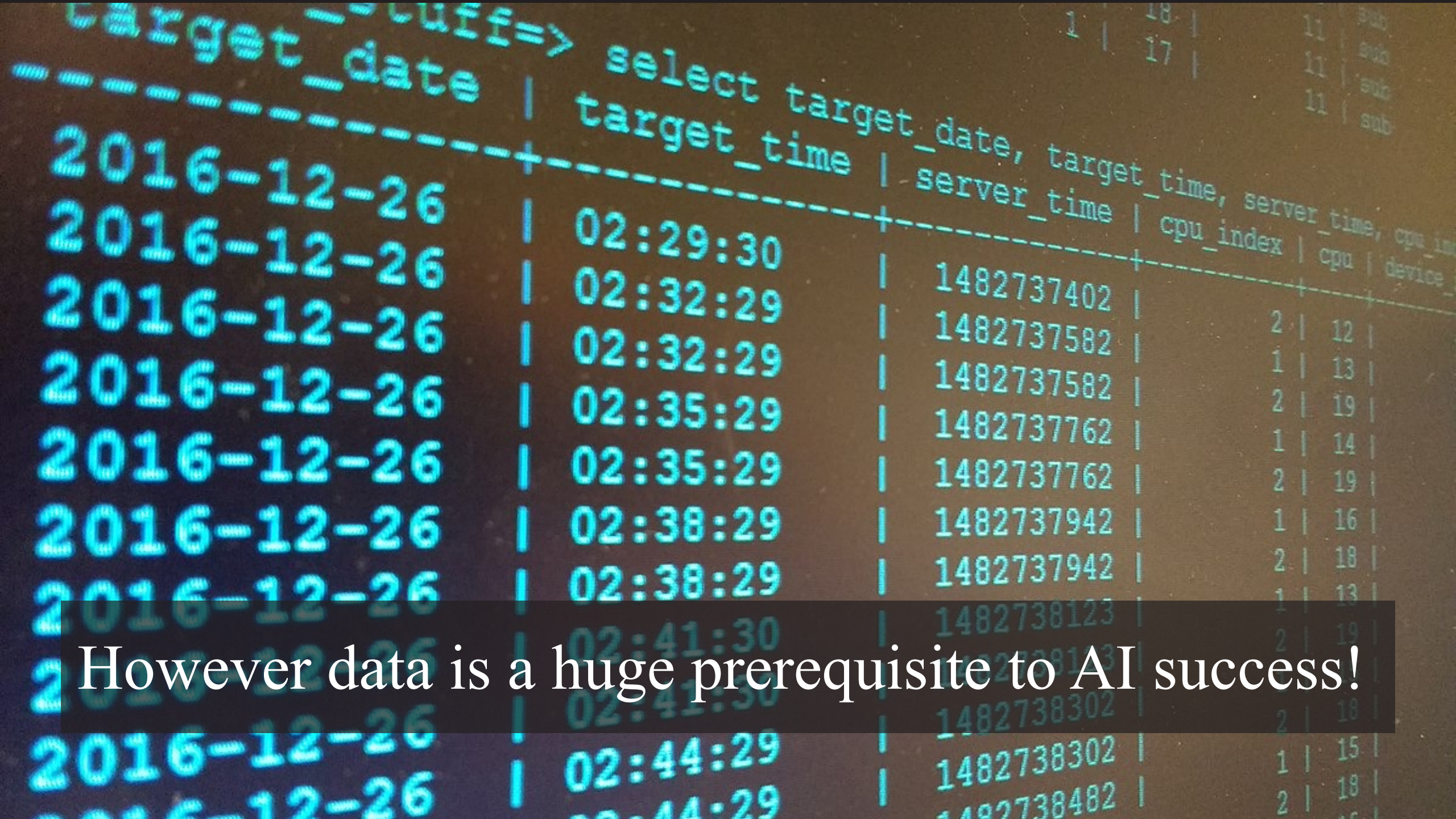
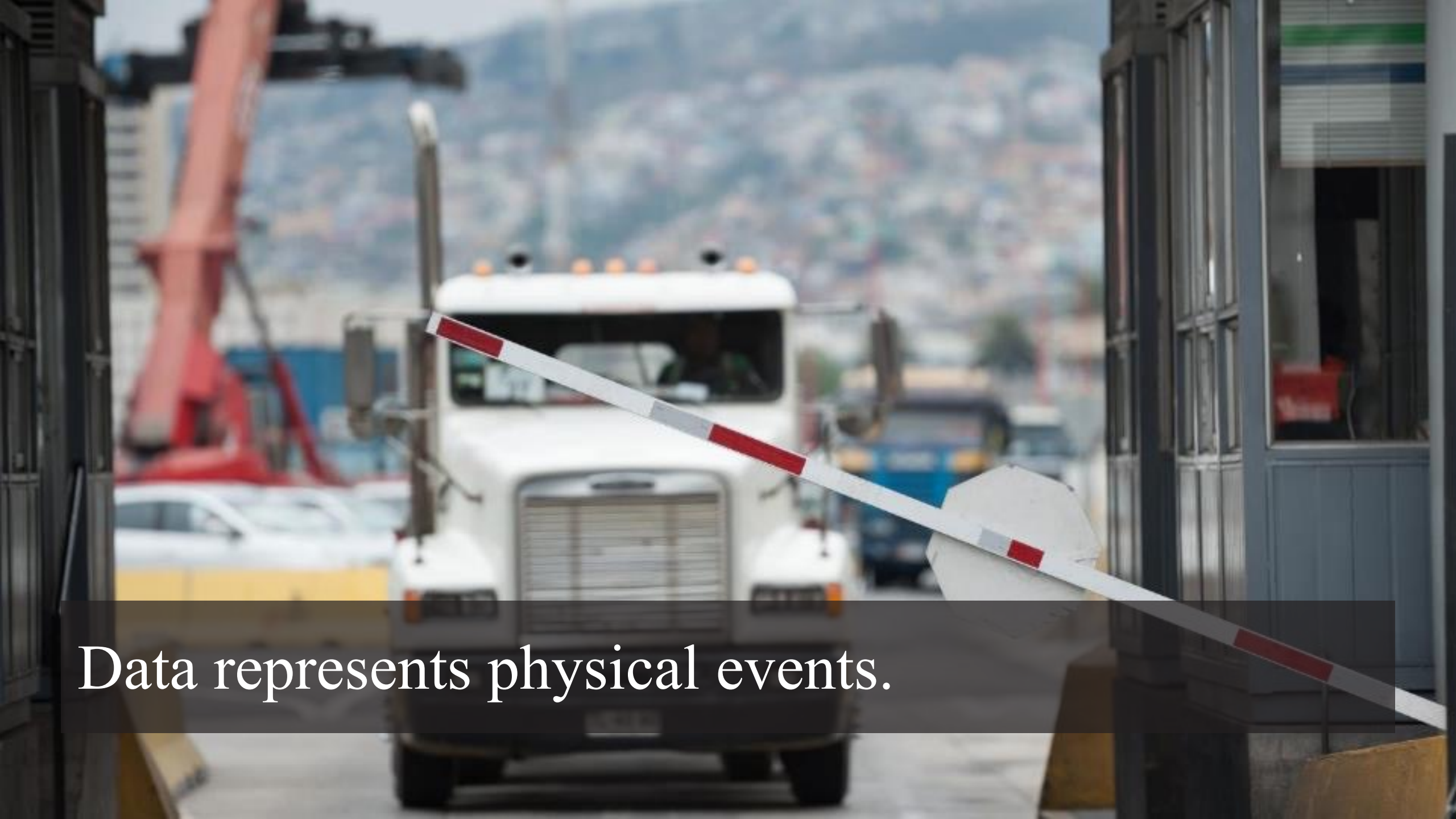


However data is a huge prerequisite to AI success!



Data represents physical events.

Data represents digital events.

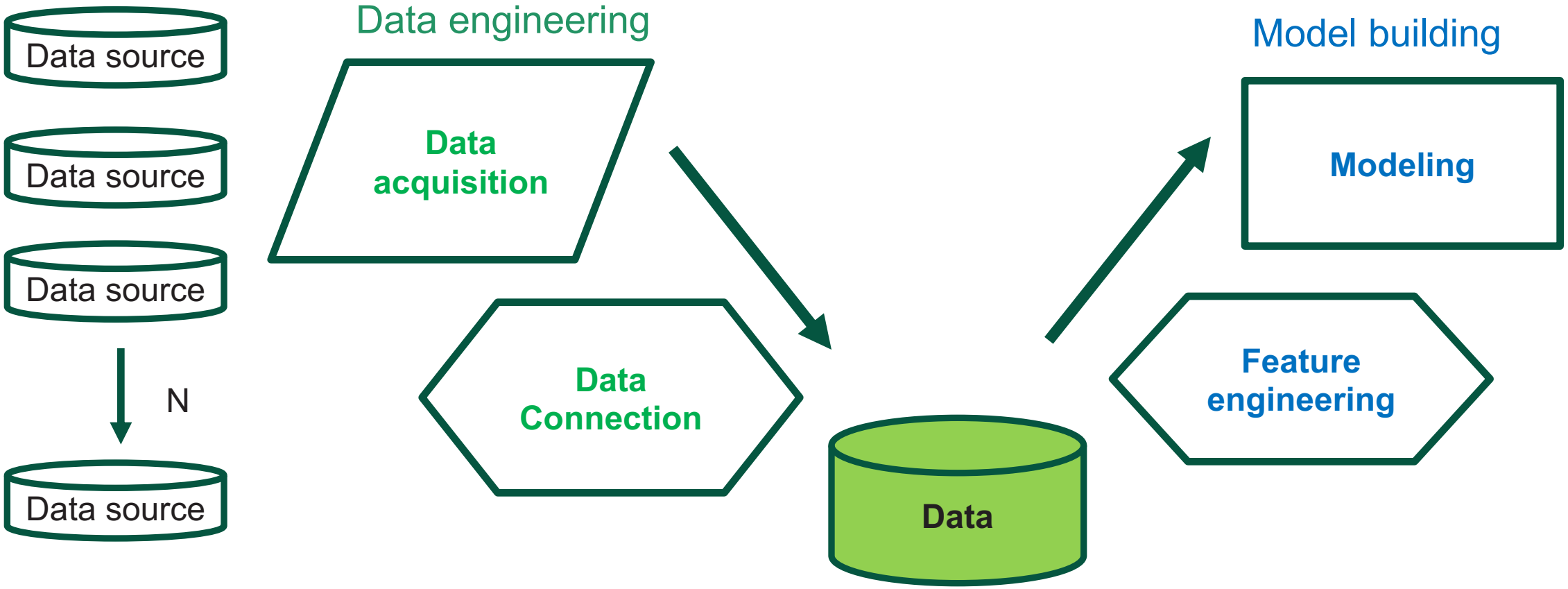
Data represents customer events.

Data represents market events.

Data represents business events.

. . . however, messy data without Context can dramatically slow the AI process

Separate data engineering tasks from ML model building tasks to make model building faster, more focused on business use cases



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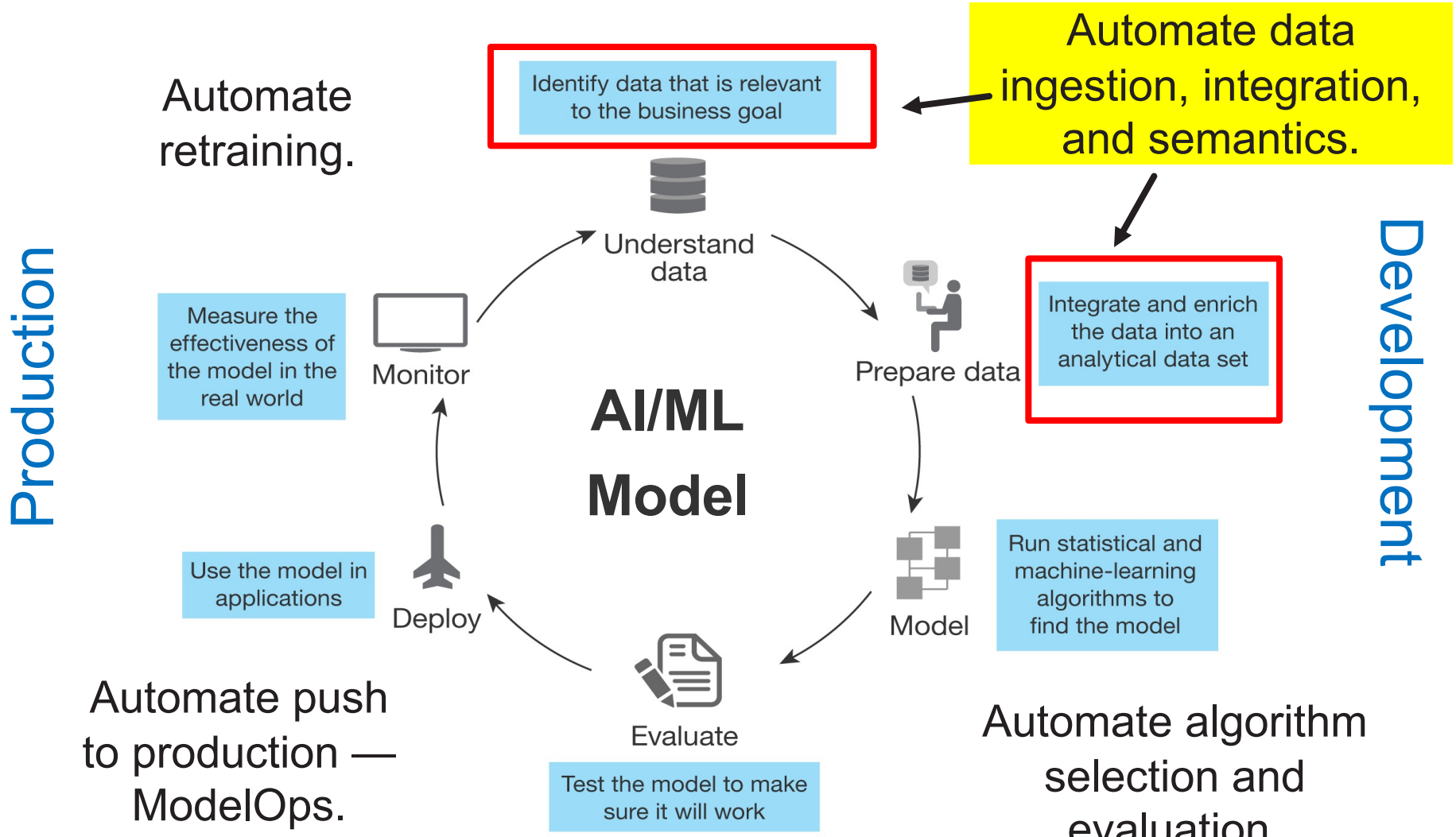
Algorithms get all the press, but it's all about data that leads to AI success!

The AI model building lifecycle is an iterative and continuous process …. And it all starts with data!



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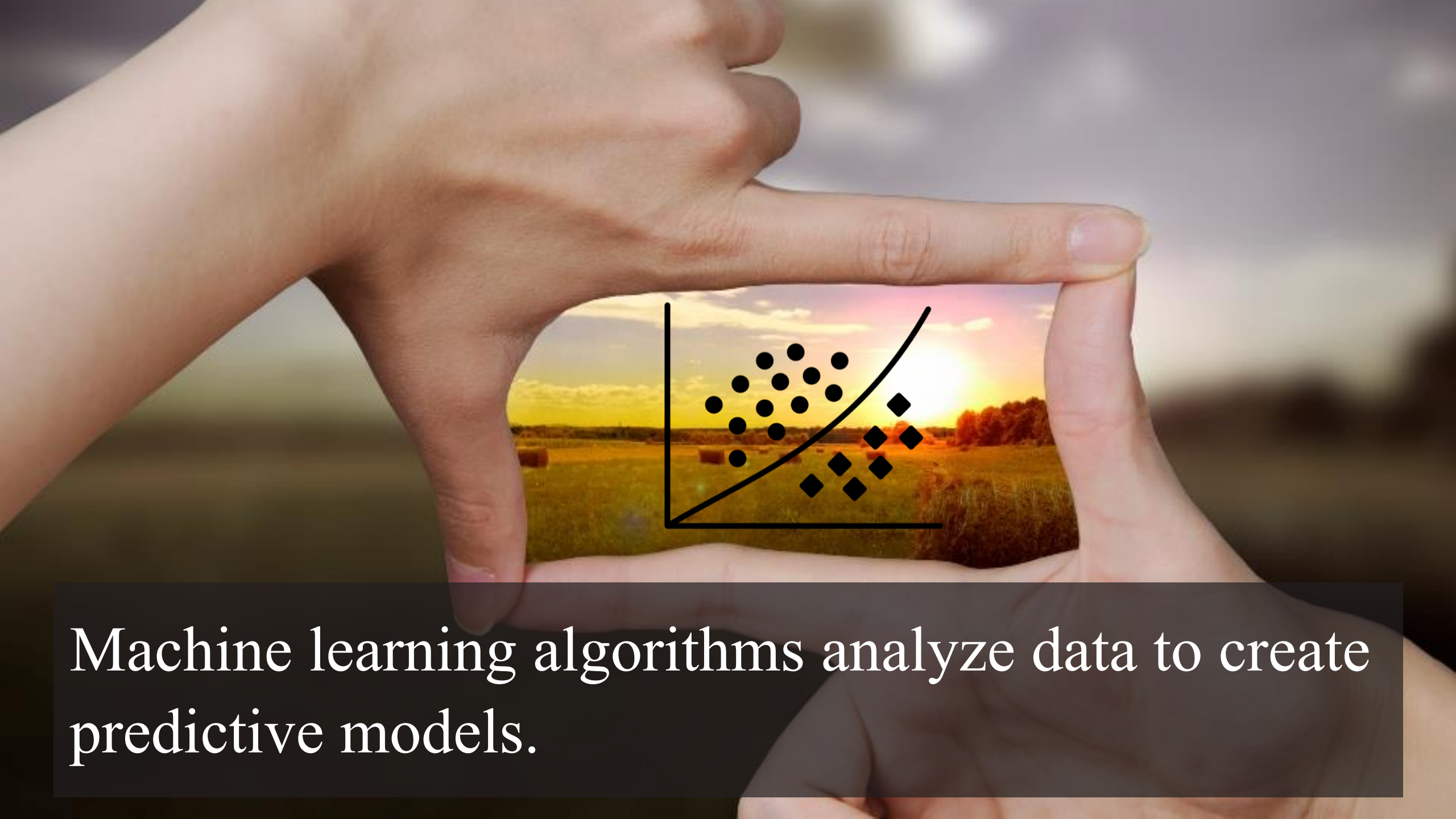

Machine learning algorithms analyze data to create predictive models.

ML can help predict supply chain issues while there is still time to remediate.

Graph and AI can help determine which shipments to prioritize and where to reroute to.

ML can help predict who will launch what cyberattack before it happens.
Graph and AI can help determine what systems are more vulnerable and need attention.

ML can help predict customers likely to churn.

Graph and AI can determine the best way to retain customers and improve customer experience.

ML can help predict machine faults before they shut down the production line.

Graph and AI can help determine when to shut the production line down to minimize cost and deliver best business performance.

Graph data platform market has exploded over the past two years – with many solutions…

Forrester first ever Graph data platform Wave, Q4 2020!

Graph data platform takes AI/ML to the next level! … invest in it and make it part of your digital transformation strategy to gain competitive edge!

Thank You.

Noel Yuhanna
Vice President, Principal Analyst

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