INNOVATE

MODERN APPLICATIONS EDITION

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Rapid innovation with the transformative power of modern applications

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Topics

Defining modern business
What is our problem or opportunity?

Defining how modern applications enable modern business
How did we get here?

Understanding how compute enables modern applications and benefits a modern business

Why modernize?

SPEED TO INNOVATION

AGILITY TO CHANGE WHAT MATTERS

REDUCED RISK

IMPROVED OPERATIONAL EFFICIENCY

COST AND VALUE CONTROL

Time to market
Modern businesses gain accelerated path to reaching out to new and existing customers

Opportunity to change
Capitalize on new opportunities when they present themselves

Assurance and guard rails
Rapid experimentation and mitigation without the potential of high scale collateral impact

Customer engagement
Manage, maintain and improve differentiation

Cloud platform and services
Freeing up resources to focus on business value, customer outcome in a pay for value model

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“We have had a 10-year digital shock.

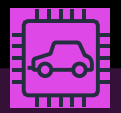
In the space of a couple of weeks, COVID-19 has changed the economy more than the next 10 years of digitization would have managed.”

Half a Billion…

The number of new applications will be built between 2020 and the end of 2023, more than 40 years of application development

Why now?

‘Disrupt and avoid disruption’ is becoming a common viewpoint

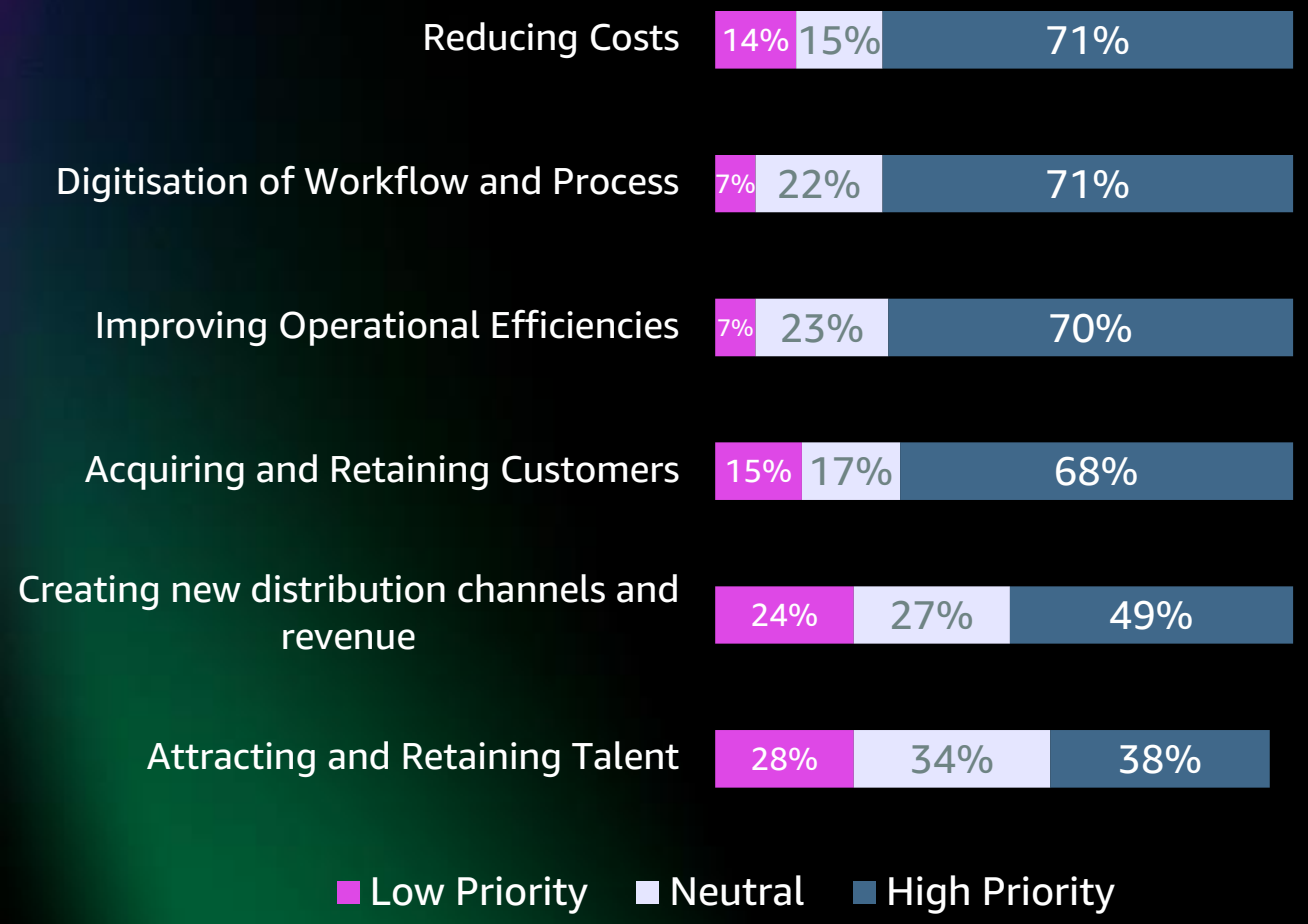


Enterprises focused on modernization will adapt to disruption faster

Enterprises will shift to cloud-centric infrastructure and applications

Technical debt will cause financial stress and drag on IT agility

Why now? Modernizing directly aids the new norm



SPEED TO INNOVATION

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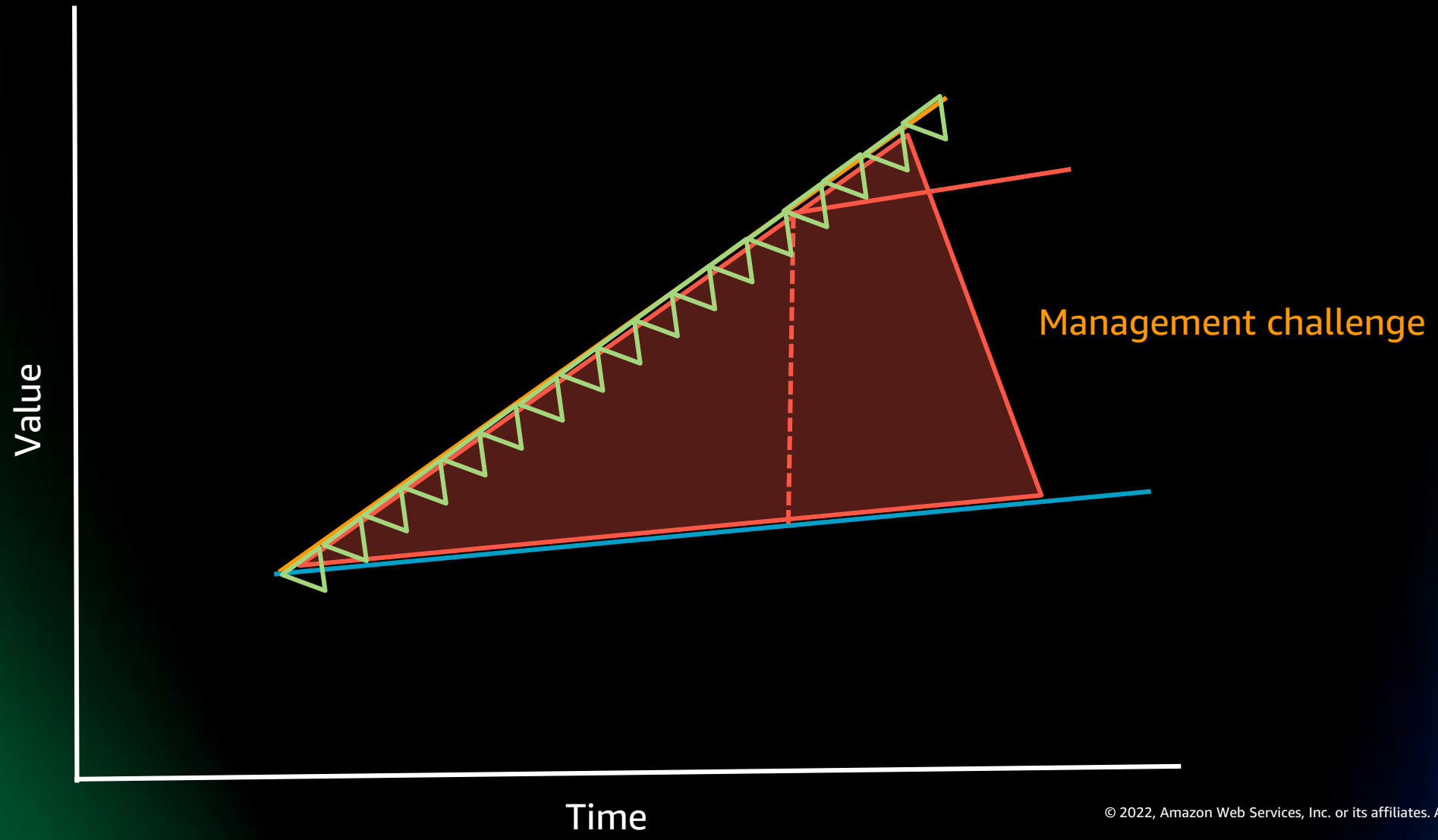
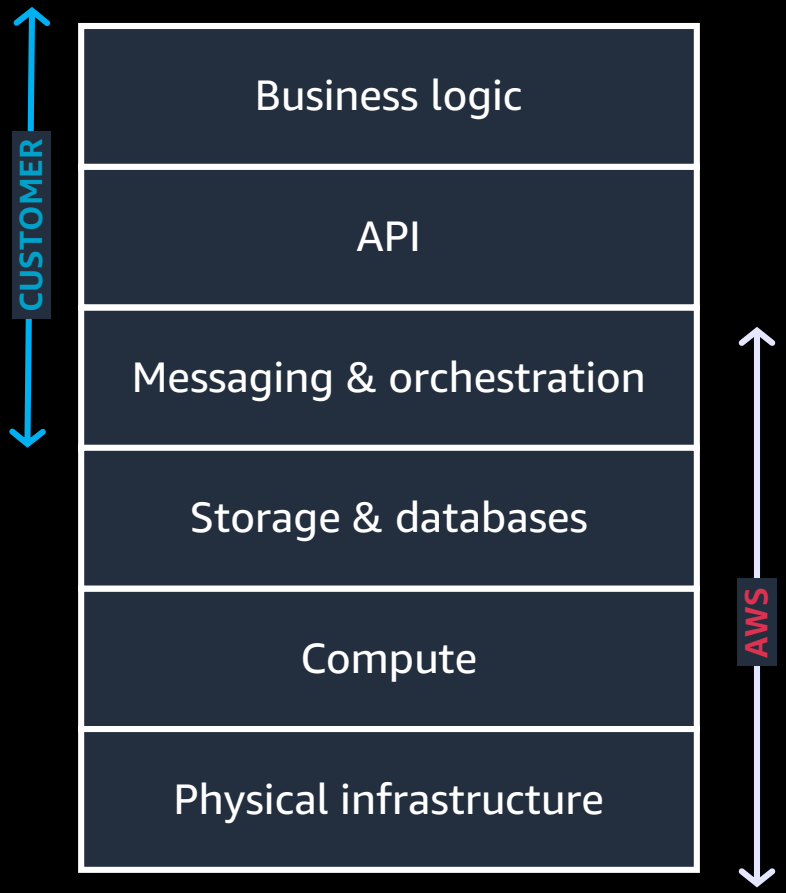
The transformative power of application modernization



AWS provides direct access to business value

Focus on creating
business value

Agility
comes from doing less of this



Innovation
comes from doing more of this

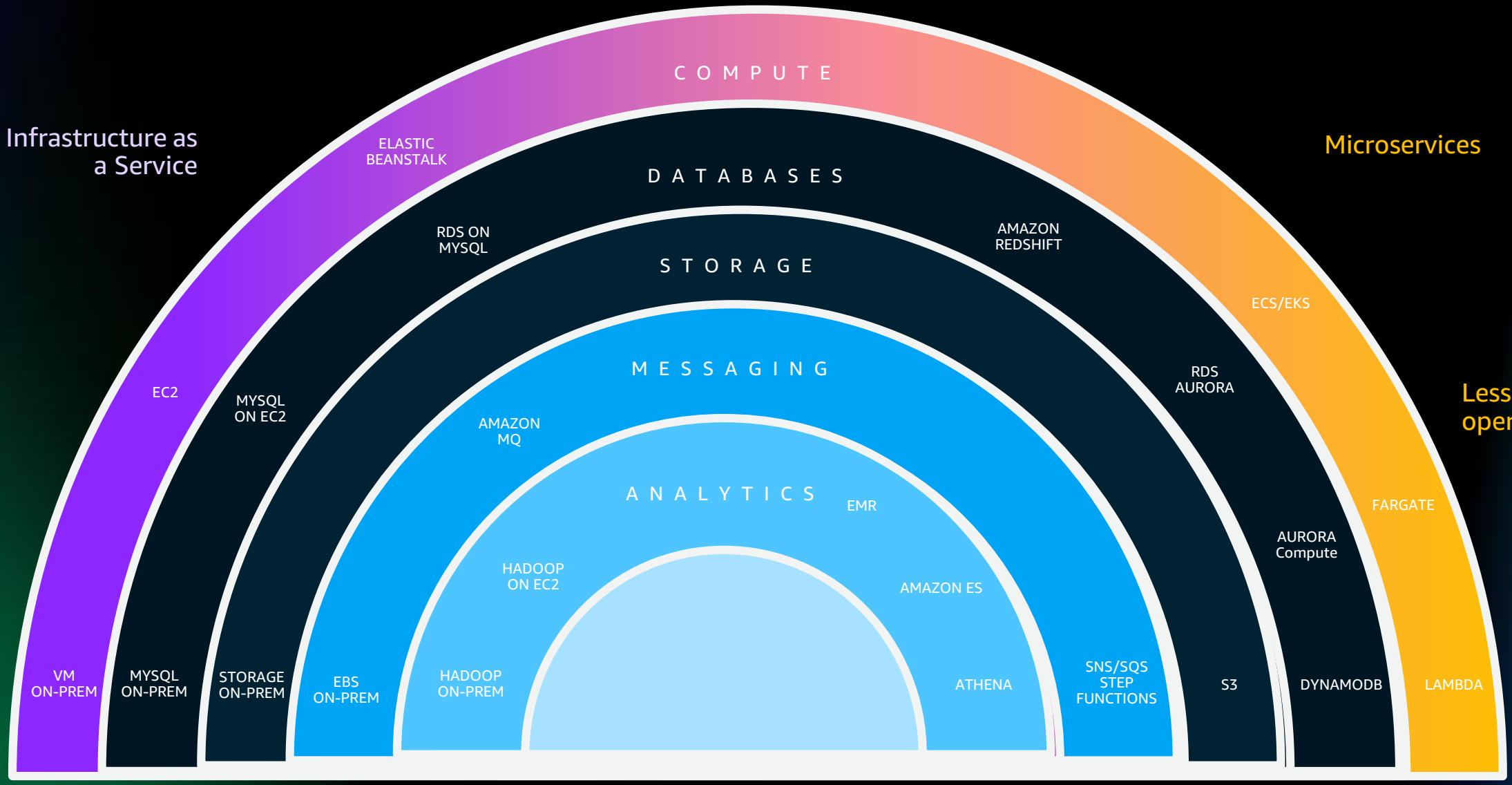
Remove heavy lifting with
modern applications

Compute evolution – A shift for modernization

	LEVEL OF MODERNIZATION			
	ON-PREMISES	VIRTUAL MACHINES (Amazon EC2 / VMware Cloud on AWS)	CONTAINERISATION (Amazon ECS/Amazon EKS)	SERVERLESS (AWS Lambda/AWS Fargate)
Application code	✓	✓	✓	✓
Data source integrations	✓	✓	✓	✓
Capacity planning and scaling	✓	✓	✓	✓
Software install and maintenance	✓	✓	✓	✓
Infrastructure provisioning	✓	✓	✓	✓
Physical server, storage, networking, and facilities	✓	✓	✓	✓
Security and network configuration			✓	

MANAGED BY | ✓ CUSTOMER ✓ AWS

Compute is an operational concept



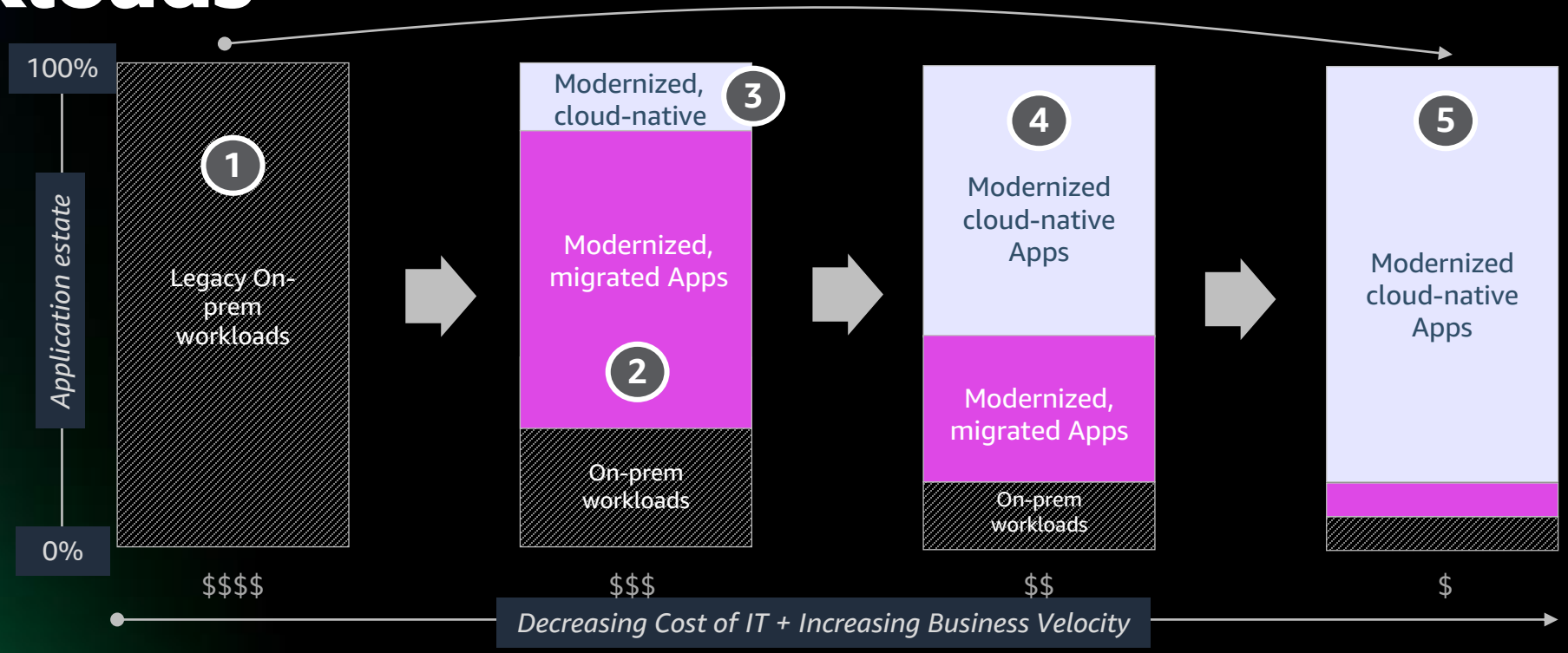
How much impact does this really have?

	IaaS 'machine images'	PaaS 'containers'	FaaS 'serverless'
% productivity increase	10-20%	20-30%	30-40%
Time to market	Monthly to fortnightly	Fortnightly to as needed	Daily to multiple times per day
Change vs run ratio	40:60	50:50	70:30

Modernization paths - what to prioritize?

MODERNIZATION PATH		FOCUS ON
Build new (Cloud-native)		Serverless, event-driven architecture
Re-platform (Migrate to modernize)		a/Containerization, b/Cluster migration
Re-factor (Re-architect)		Modernize architecture, software delivery, operations
Modern operations / Shared services platform		Consistent tooling, governance, guardrails, GitOps, operational model

Adoption pattern: Organic modernizing of workloads



1. Conduct assessment / Pilot
2. Migrate legacy workloads
3. Modernize, or build new cloud-native workloads
4. Transition Migrated legacy workloads to modernized workloads
5. Complete cloud-native Transformation

In closing – What does *good* look like?

Challenges and solutions

Challenge | Solution

Challenge	Solution
Developers wait days / weeks for infrastructure to be provisioned	Developers provision infrastructure on demand and deploy in minutes
Software is manually deployed on an ad-hoc basis	Software delivery is automated via continuous delivery pipelines
Security is configured ad-hoc for each application	Security best practices are baked in to every application and service
Developers lack visibility into applications running in production	Applications are fully instrumented for metric and log collection
Tooling is inconsistent across teams and business units	Organizations standardize on tools and best practices

Visit the Modern Applications resource hub

Dive deeper with these resources to help you develop an effective plan for your modernization journey.

- Build modern applications on AWS
- Business value of cloud modernization
- An introduction to event-driven architectures
- Accelerate full-stack web and mobile app development
- Determining the total cost of ownership: Comparing serverless and server-based technologies
- Building event-driven architectures with AWS
- Continuous learning, continuous modernization

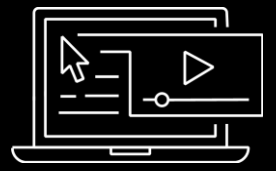
https://tinyurl.com/modern-apps-aws

Visit resource hub

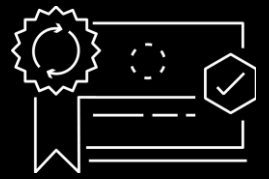
AWS Training and Certification

Get started with Free Digital Training for you and your team today

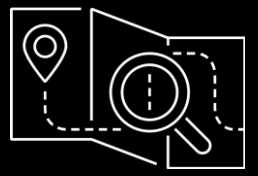
Achieve key milestones and plan your next steps with the AWS Modern Application skills training



Access 500+ free digital courses with AWS Skill Builder



Earn an industry-recognized credential:
AWS Certified Developer – Associate
AWS Certified DevOps – Professional



Create a self-paced learning roadmap
AWS ramp-up guide - Developer
AWS ramp-up guide - DevOps

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Thank you!