

Cloud Performance Metrics

- Introduction
- Motivation
- Methodologies
- Solutions



Introduction

- Definitions
- Looking Back
- Looking Ahead



Introduction - Definitions

Cloud Computing

A model for enabling ubiquitous, convenient, ondemand network access to a shared pool of configurable computing resources (e.g., networks, servers, storage, applications, and services) that can be rapidly provisioned and released with minimal management effort or service provider interaction. (NIST SP 800-145)





Introduction - Definitions

- FedRAMP

The Federal Risk and Authorization Management Program (FedRAMP) is a government-wide program that provides a standardized approach to security assessment, authorization, and continuous monitoring for cloud products and services. (GSA.gov)





Introduction - Looking Back

- Maturity of Cloud Products & Services
 - Cloud Products and Services are well established and continue to become more mature
 - Industry Leaders have emerged
 - Product offerings have matured
 - Providers have answered consumer demands
 - More visibility into products and services provided



Introduction - Looking Ahead

- Future of Cloud Computing
 - Datacenter Automation
 - Next Generation Technologies
 - BYOD



Motivation

- Why Cloud Computing?
 - Value Proposition
 - Reliability
 - Agility
 - Compliance
 - Data Privacy



- Performance Metrics two basic directions
 - Utilize service provider tools
 - Utilize third party tools
 - Combination of the two



- Service Provider Tools Pros
 - Financial and Performance Dashboards
 - Provided as part of the service
 - Visibility into all layers
 - Granular metrics



- Service Provider Tools Cons
 - Objective assessment?
 - Provided as part of the service generally means basic options. More detailed reporting may require additional cost.
 - Generally do not help consumers baseline and compare between other service providers



- Third Party Tools Pros
 - Provides Objectivity
 - Detailed comparison between multiple service providers
 - Custom consulting on service provider selection to meet business and operational needs



- Third Party Tools Cons
 - May not provide level of granularity that service provider offers
 - Additional cost
 - One more thing



Solutions

- Identify the performance metrics that matter to you and meet your business needs
- Select a Service Provider who will meet your needs with detailed SLAs and monitoring capabilities
- Select a trusted partner who can help navigate pitfalls, compliance, security and privacy issues



Bonus Slides

- Federal Cloud Considerations FedRAMP
 - Service Providers receive Provisional Authority to Operate
 Risk acceptance still with the Federal consumer
 - How do you measure compliance, <u>continuous monitoring</u> and data privacy performance?
 - (Provisional) Authorization to Operate does not equal functionality
 - Assessments are only as good as the assessors
 - Trusted Advisor



- FedRAMP

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Cloud Implementations



EDS

CLOUD COMPUTING Revolutionizing Business Processes in Government & Healthcare EAST 2014 Downtown Washington, DC





- Aspiryon brings:
 - Deep experience developing & deploying Federal Cloud services
 - Full Security life cycle for Federal Cloud Deployments from Development, to Authorization To Operate to Continuous Monitoring
 - Cloud Service Provider, Broker and Federal Consumer Security, Privacy and Compliance support
 - Independent Assessment Consulting
 - laaS, PaaS and SaaS Security Engineering and Consulting experience





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