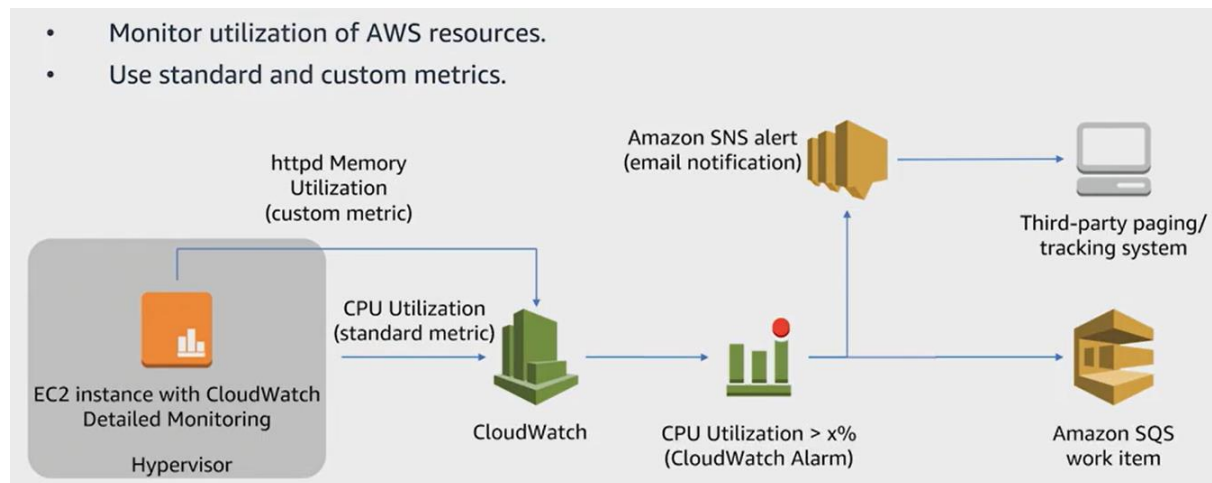


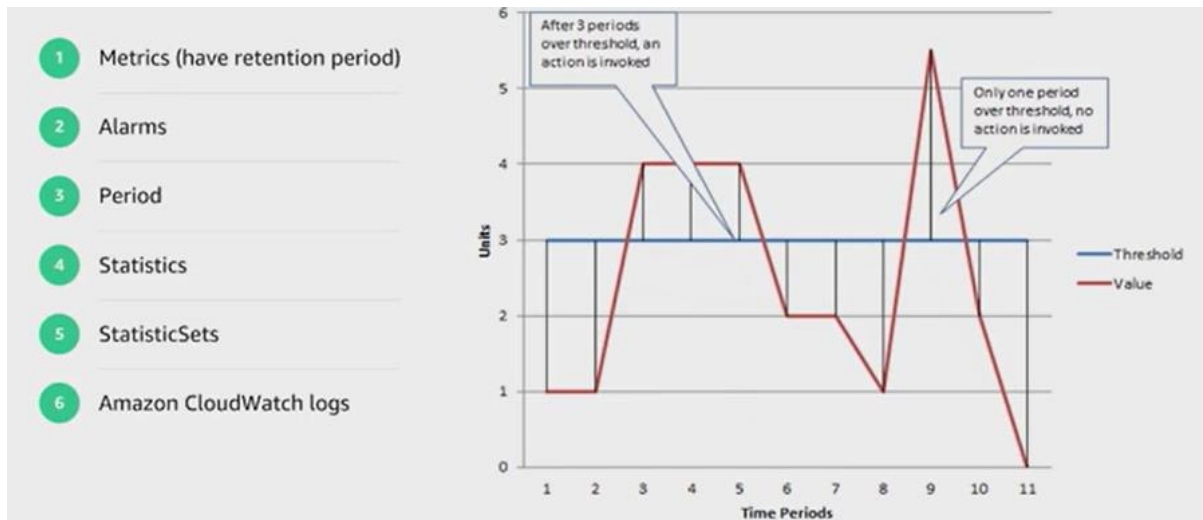
Domain 5:

Monitoring and troubleshooting:

- ✓ Check the AWS error code returned from operations
 - 400 series: Handle error in application
 - 500 series: Retry operation
- ✓ Collection and analysis of log data from instances, such as:
 - System logs
 - HTTP logs
- ✓ Monitoring of:
 - Instance health and performance
 - Availability of managed services (such as Amazon RDS)
 - Network performance
 - Utilization for cost efficiency
 - Unused or under-used instances running

Amazon CloudWatch:






AWS CloudTrail:

AWS CloudTrail can help you **answer questions** requiring detailed analysis.

-  **Who shut down a specific instance?**
-  **Who changed a security group configuration?**
-  **Is any activity coming from an unknown IP address?**
-  **What activities were denied due to lack of permissions?**

AWS X-ray:



Helps developers analyze and debug production, distributed applications.

- Create a Service Map.
- Identify errors and bugs.
- Identify performance bottlenecks.
- Build your own analysis and visualization apps.

Test Axioms:

- Always check security groups and network access control lists when troubleshooting.
- Instances launched into a private subnet in a VPC can't properly communicate with the Internet unless you use NAT.
- You need an IGW and a route in the route table to talk to the Internet.
- EBS volumes are loosely coupled to EC2 instances; can attach/detach except for the boot volume.