INSTANCE FEATURES

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LINUX ADMINISTRATOR AND CERTIFIED SOLUTIONS ARCHITECT AWS

ROADMAP

- **INSTANCE TYPES**
- **INSTANCE SPECIFICATIONS**
- **INSTANCE PRICING**

INSTANCE TYPES

General Purpose-T2

Features:

- High Frequency Intel Xeon Processors with Turbo up to 3.3GHz
- Burstable CPU, governed by CPU Credits, and consistent baseline performance
- Lowest-cost general purpose instance type, and Free Tier eligible (t2.micro only)
- Balance of compute, memory, and network resources

INSTANCE SPECIFICATIONS

Model	vCPU	CPU Credits / hour	Mem (GiB)	Storage
t2.nano	1	3	0.5	EBS-Only
t2.micro	1	6	1	EBS-Only
t2.small	1	12	2	EBS-Only
t2.medium	2	24	4	EBS-Only
t2.large	2	36	8	EBS-Only

INSTANCE TYPES

General Purpose-M4

Features:

- 2.4 GHz Intel Xeon® E5-2676 v3 (Haswell) processors
- EBS-optimized by default at no additional cost
- Support for Enhanced Networking
- Balance of compute, memory, and network resources

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	SSD Storage (GB)	Dedicated EBS Throughput (Mbps)
m4.large	2	8	EBS-only	450
m4.xlarge	4	16	EBS-only	750
m4.2xlarge	8	32	EBS-only	1,000
m4.4xlarge	16	64	EBS-only	2,000
m4.10xlarge	40	160	EBS-only	4,000

INSTANCE TYPES

General Purpose-M3

Features:

- High Frequency Intel Xeon E5-2670 v2 (Ivy Bridge) Processors*
- SSD-based instance storage for fast I/O performance
- Balance of compute, memory, and network resources

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	SSD Storage (GB)
m3.medium	1	3.75	1 x 4
m3.large	2	7.5	1 x 32
m3.xlarge	4	15	2 x 40
m3.2xlarge	8	30	2 x 80

INSTANCE TYPES

Compute Optimized-C4

Features:

- High frequency Intel Xeon E5-2666 v3 (Haswell) processors optimized specifically for EC2
- EBS-optimized by default and at no additional cost
- Ability to control processor C-state and P-state configuration on the c4.8xlarge instance type
- Support for Enhanced Networking and Clustering

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	Storage	Dedicated EBSThroughput (Mbps)
c4.large	2	3.75	EBS-Only	500
c4.xlarge	4	7.5	EBS-Only	750
c4.2xlarge	8	15	EBS-Only	1000
c4.4xlarge	16	30	EBS-Only	2000
c4.8xlarge	36	60	EBS-Only	4,000

INSTANCE TYPES

Compute Optimized-C3

Features:

- High Frequency Intel Xeon E5-2680 v2 (Ivy Bridge) Processors
- Support for Enhanced Networking
- Support for clustering
- SSD-backed instance storage

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	SSD Storage (GB)
c3.large	2	3.75	2 x 16
c3.xlarge	4	7.5	2 x 40
c3.2xlarge	8	15	2 x 80
c3.4xlarge	16	30	2 x 160
c3.8xlarge	32	60	2 x 320

INSTANCE TYPES

Memory Optimized-R3

Features:

- High Frequency Intel Xeon E5-2670 v2 (Ivy Bridge) Processors
- Lowest price point per GiB of RAM
- SSD Storage
- Support for Enhanced Networking

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	SSD Storage (GB)
r3.large	2	15.25	1 x 32
r3.xlarge	4	30.5	1 x 80
r3.2xlarge	8	61	1 x 160
r3.4xlarge	16	122	1 x 320
r3.8xlarge	32	244	2 x 320

INSTANCE TYPES

GPU-G2

Features:

- High Frequency Intel Xeon E5-2670 (Sandy Bridge) Processors
- High-performance NVIDIA GPUs, each with 1,536 CUDA cores and 4GB of video memory
- Each GPU features an on-board hardware video encoder designed to support up to eight real-time HD video streams (720p@30fps) or up to four real-time full HD video streams (1080p@30fps)
- Support for low-latency frame capture and encoding for either the full operating system or select render targets, enabling high-quality interactive streaming experiences

INSTANCE SPECIFICATIONS

Model	GPUs	vCPU	Mem (GiB)	SSD Storage (GB)
g2.2xlarge	1	8	15	1 x 60
g2.8xlarge	4	32	60	2 x 120

INSTANCE TYPES

Storage Optimized I2 – High I/O Instances

Features:

- High Frequency Intel Xeon E5-2670 v2 (Ivy Bridge) Processors
- SSD Storage
- Support for TRIM
- Support for Enhanced Networking
- High Random I/O performance

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	Storage (GB)
i2.xlarge	4	30.5	1 x 800 SSD
i2.2xlarge	8	61	2 x 800 SSD
i2.4xlarge	16	122	4 x 800 SSD
i2.8xlarge	32	244	8 x 800 SSD

INSTANCE TYPES

D2 – Dense-storage Instances

Features:

- High-frequency Intel Xeon E5-2676v3 (Haswell) processors
- HDD storage
- Consistent high performance at launch time
- High disk throughput
- Support for Amazon EC2 Enhanced Networking

INSTANCE SPECIFICATIONS

Model	vCPU	Mem (GiB)	Storage (GB)
d2.xlarge	4	30.5	3 x 2000 HDD
d2.2xlarge	8	61	6 x 2000 HDD
d2.4xlarge	16	122	12 x 2000 HDD
d2.8xlarge	36	244	24 x 2000 HDD

INSTANCE PRICING

On-demand instances let you pay for compute capacity by the hour with no long-term commitments.

This frees you from costs and complexities of planning, purchasing, and maintaining hardware and transforms what are commonly large fixed costs into much smaller variable cost.

WEB URL : https://aws.amazon.com/ec2/pricing/

INSTANCE PRICING

- **Reserved Instances** give you the option to make a one time payment for each instance you want to reserve and in turn receive a significant discount on the hourly usage charge for that instance.

- **Spot instances** enable you to bid for unused Amazon Ec2 capacity. Instances are charged the Spot Price which is set by Amazon Ec2 and fluctuates periodically depending on the supply of and demand for Spot Instance capacity.

Thank you