

## EC2 - Placement Groups

- It is recommended that you launch the number of instances that you need in the placement group in a single launch request and that you use the same instance type for all instances in the placement group.
- If you try to add more instances to the placement group later, or if you try to launch more than one instance type in the placement group, **you increase your chances of getting an insufficient capacity error.**
- **If you stop an instance in a placement group and then start it again, it still runs in the placement group. However, the start fails if there isn't enough capacity for the instance.**
- **If you receive a capacity error when launching an instance in a placement group that already has running instances, stop and start all of the instances in the placement group, and try the launch again.**
- Restarting the instances may migrate them to hardware that has capacity for all the requested instances.

### References:

<https://docs.aws.amazon.com/AWSEC2/latest/UserGuide/placement-groups.html#placement-groups-cluster>

[http://docs.amazonaws.cn/en\\_us/AWSEC2/latest/UserGuide/troubleshooting-launch.html#troubleshooting-launch-capacity](http://docs.amazonaws.cn/en_us/AWSEC2/latest/UserGuide/troubleshooting-launch.html#troubleshooting-launch-capacity)

### Check out this Amazon EC2 Cheat Sheet:

<https://tutorialsdodo.com/aws-cheat-sheet-amazon-elastic-compute-cloud-amazon-ec2/>