Elasticsearch

For Developer







In My Opinion

1. Change cluster/node name

cluster.name: elasticsearch_production

node.name: elasticsearch_005_data

https://www.elastic.co/guide/en/elasticsearch/guide/current/_important_configuration_changes.html

2. Change files path

path.data: /path/to/data1,/path/to/data2

path.logs: /path/to/logs

path.plugins: /path/to/plugins

https://www.elastic.co/guide/en/elasticsearch/guide/current/_important_configuration_changes.html

3. Disable delete all index

action.destructive_requires_name: true

https://www.elastic.co/guide/en/elasticsearch/reference/1.7/indices-delete-index.html

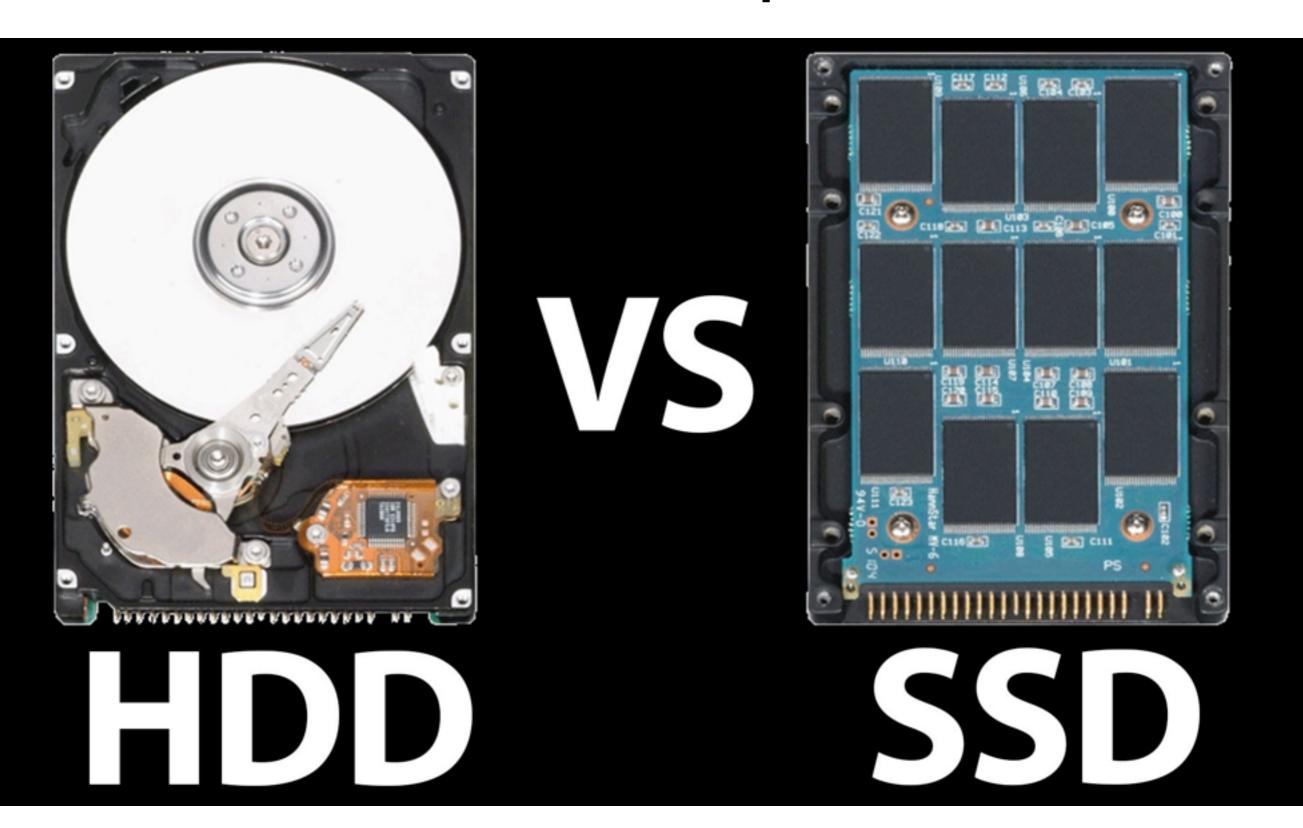
4. Use unicast discovery

discovery.zen.ping.multicast.enabled: false

discovery.zen.ping.unicast.hosts: ["host1", "host2:port"]

https://www.elastic.co/guide/en/elasticsearch/reference/current/modules-discovery-zen.html

5. Use SSD to improve I/O



6. Use right JDK

Don't use OpenJDK and other implementation

7. Use dedicate master node

node.master: true

node.data: false

Don't use for query and indexing

8. Client node

node.master: false

node.data: false

For query data only or Smart Load balance

9. Allocate physical memory

OS 50% ES 50%

export **ES_HEAP_SIZE**=10g

OR

./bin/elasticsearch **-Xmx10g -Xms10g**

https://www.elastic.co/guide/en/elasticsearch/guide/current/_limiting_memory_usage.html

10. Index buffer size

indices.memory.index_buffer_size: 10%

Default = 10%, you can update with #of write data

https://www.elastic.co/guide/en/elasticsearch/reference/1.7/modules-indices.html

11. Index management

For time series use Curator

https://github.com/elastic/curator

12. Avoid memory swapping

\$sudo swapoff -a

OR

bootstrap.mlockall: true

https://www.elastic.co/guide/en/elasticsearch/guide/current/heap-sizing.html?q=sw

13. Use circuit breaker

Avoid OutOfMemoryException

https://www.elastic.co/guide/en/elasticsearch/guide/current/_limiting_memory_usage.html#circuit-breaker

14. Increase # of open file descriptor

\$ulimit -n 123456

\$ulimit -l unlimited

https://www.elastic.co/guide/en/elasticsearch/reference/current/setup-configuration.html

15. Application performance management

Monitoring and Alert



