**Node-Express-Mongo Theory**

1. Node is a JavaScript runtime built on Google’s open source V8 JavaScript engine.
2. Node.JS pros:
   1. Single-threaded, based on event driven, non-blocking I/O model
   2. Perfect for building fast and scalable data-intensive apps;
   3. Some big companies uses node in production(Netflix, uber, PayPall, ebay…)
   4. JavaScript across the entire stack: faster and more efficient development;
   5. NPM: huge library of open-source packages available for everyone for free
   6. Very active developer community
3. Use Node.JS for:

- API with database behind it (preferably NoSQL);

- Data streaming (think Youtube);

- Real-time chat application

-Server-side web application

1. Don’t use Node.JS for the heavy server-side processing (CPU intensive) like image processing, video manipulation, file compressing etc.
2. Node is Single Threaded so if you use synchronous code it means that any other operation needs to wait for the first one to be finished
3. Use Asynchronous functions for executing operations. Using callback function in Node.JS
4. To avoid callback hell we can use Promises or Async/Await