1. Download and install mutichain version 1.0 through following steps

* su (enter root password)
* cd /tmp
* wget https://www.multichain.com/download/multichain-1.0-beta-1.tar.gz
* tar -xvzf multichain-1.0-beta-1.tar.gz
* cd multichain-1.0-beta-1
* mv multichaind multichain-cli multichain-util /usr/local/bin (to make easily accessible on the command line)
* exit (to return to your regular user)

1. Multichain version can be checked by running multichaind -version on the command line.
2. First create a new chain named chain1 running command multichain-util create chain1
3. Start the chain by running multichaind chain1 - daemon command
4. Create stream name stream1 using create stream stream1 false command
5. Write data on created stream running publish stream1 key1 73747265616d2064617461 command (here key1 is key and value is always in hexadecimal)
6. To check stream data run command liststreams
7. Now upgrade it to multichain 2.0 using mentioned steps

* If MultiChain is currently running for a chain, you can check its version in the “version” field of the response to the getinfo command. There is also a “nodeversion” field containing a numerical version which is guaranteed to increase with each release.
* To upgrade MultiChain, stop any running nodes using the stop API command (i.e. multichain-cli [chain-name] stop from the command line). Also exit from any “multichain-cli” processes running in interactive mode using exit command.
* Verify that no MultiChain software is currently running, use ps –x command.
* Now follow the step1, overwriting the previous versions of the MultiChain executables, use <https://www.multichain.com/download/multichain-2.0-release.tar.gz> link now in place 1.0
* Finally Restart any nodes required in the normal way multichaind chain1 –daemon

1. Now publish in the stream using multichain 2.0 features **as** MultiChain 2.0 adds a ton of functionality relating to streams, first publish some data in text and JSON formats, with some items having multiple keys
2. If an error -8 comes, get multichain protocol version using getinfo command.
3. If protocol version is 10008 means need to upgrade protocol version to 20009 (version must be at least 10008 to allow protocol upgrading)
4. Follow the steps to upgrade multichain protocol version

* Create the pending (as yet unapproved) upgrade from an address which has both “admin” and “create” permissions. A node with the private key for this address should run the following
* createfrom [from-address] upgrade [upgrade-name] false '{"protocol-version":[new-version]}'
* To apply the upgrade from a specific block number, substitute '{"protocol-version":[new-version],"startblock":[block-number]}' for the last parameter above.
* Check the “required” field of listupgrades [upgrade-name] to see how many administrators need to approve the upgrade. This is equal to the number of addresses with “admin” permissions multiplied by the “admin-consensus-upgrade” [blockchain parameter](https://www.multichain.com/developers/blockchain-parameters/), rounded up.
* Each required administrator should approve the upgrade by running the following on the node holding their private key:
* approvefrom [from-address] [upgrade-name] true
* After each admin’s approval, check they appear in the “admins” field of listupgrades [upgrade-name] and that “required” has gone down.
* Once enough approvals have been given, check that the “approved” field of listupgrades [upgrade-name] is “true”.
* Wait for the next block (or specified block number) to appear, then check that the “appliedblock” field of listupgrades [upgrade-name] shows this block’s height.

1. Again try to publish data in json using command publish stream1 key3 '{"text":"hello world!"}' If a transaction id comes means success

Important Note:

* While upgrading if you haven’t upgrade protocol version then you cannot take advantages of multichain-version 2.0

For example:  
If you are on multichain-version 1.0 with protocol version 10008. After Upgrading to multichain version 2.0 you will find your protocol version is still 10008 then you should to upgrade that as well (follow step 12 to upgrade protocol), other-wise it will throw error with multichain status code.