## Read Me for handling FnO Bhav Copy to convert to ticker specific time series

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There are several code files. Handling them in proper order is necessary (and logical, given the nature of work). The orders of the file (& database) and their brief explanation is given as follows:

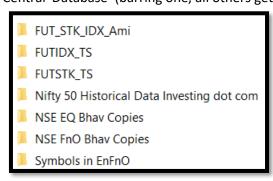
1. Two folders need to be made in a single folder, as depicted below:



2. Current version code files in the directory 'Codes\_Handling\_Central\_Database':

Dwnld_missing_EQ_Bhav_Copy.R
Dwnld_missing_FnO_Bhav_Copy.R
FUT_STK_IDX_Ami.R
☐ FUTIDX_TS.R
☐ FUTSTK_TS.R
Futures_Symbols_in_EnFnO.R
Symbols_in_EnFnO.R

3. Typical Content in the 'Central" Database' (barring one, all others get automatically created):



- 4. In the folder 'Nifty 50 Historical Data Investing dot com', the latest NIFTY50 date & OHLCV values are updated after EOD. This entry is used to gauge market open/close days and accordingly update databases and other tasks. This is not yet automated, but can be done easily, and maybe just use quantmod (Not done as quantmod is known to sometimes give erroneous/missing entries). Once done, proceed to next step.
- 5. The files 'Dwnld\_missing\_EQ\_Bhav\_Copy.R' & 'Dwnld\_missing\_FnO\_Bhav\_Copy.R' download equity and derivates data into the data base folders 'NSE EQ Bhav Copies' & 'NSE FnO Bhav Copies' respectively. Folder is made automatically if it doesn't exist already. If folder is present, only missing contents are downloaded. 181 seconds stop time provided between

- downloads. Unzipping and saving is done automatically. As NSE provides this data on the website only post 6:30 PM, this procedure can only be correctly executed post 6:30 PM.
- 6. Files 'Futures\_Symbols\_in\_EnFnO.R' & 'Symbols\_in\_EnFnO.R' are for checking if any new symbol (Futures and Equity respectively) is added into the new bhav copy files. These need not be run daily but should be done every Friday atleast. It's record is stored in the folders 'Symbols in EnFnO'. Folder is made automatically if it doesn't exist already. If folder is present, latest content is checked. If present, testing is done from the last entry. If absent, all files get scanned to generate new report.
- 7. Files 'FUTIDX\_TS.R' & 'FUTSTK\_TS.R' generate stock and index ticker wise time series data from the bhav copies. If folder is present, latest content is checked. If present, testing is done from the last entry. If absent, all files get scanned to generate new report. These codes update the existing files. If there is no existing file, then the bhav copies are checked to make the same. Thus, in case some file is deleted accidentally, no problem, it will be recreated properly from the start. The first run of the codes can take some time (days), the subsequent runs only go through the latest bhav copies, thus super-fast (seconds/minutes).
- 8. File 'FUT\_STK\_IDX\_Ami.R' works on files created in point number #7 to generate Amibroker compatible OHLCV data for all Stocks and Indices data of latest expiry in the folders 'FUT\_STK\_IDX\_Ami' in the Central Database folder.
- 9. Along the same lines, currently, Handling Options data with different Strikes, CE/PE, expiry is under construction using the same bhav copy database.

