Updating history

No.	Issue Date	Details
1	2005-01	First issue
2	2013-09-30	▪ Include files for After-Hours Trading Session ▪ Incorporate Tick-by-Tick Data – Equity Index Futures/Options (Daily File)

This file specification applies to 2 data products:

- Tick-by-Tick Data – Equity Index Futures/Options (Monthly File); and
- Tick-by-Tick Data – Equity Index Futures/Options (Daily File)

Data structure – January 2005 to 11 October 2013

The data provided in Tick-by-Tick Data – Equity Index Futures/Options are presented in 3 types of files:

1) Tick-by-tick data file;
2) Product master file; and
3) Contract master file.

The tick-by-tick data file is the core data file, while the latter two files provide static information on each contract covered in the tick-by-tick data file. For convenient data retrieval, the data files are provided in both fixed length text (.txt) and comma separated values (.csv). These 2 files only differ in format, but identical in data contents.

The data files are zipped into a single file for delivery. The following table lists out the data files to be found within the zipped file:

(Monthly File)

File name	Contents
Day Trading Session	
*yyyymm*_01_TR.txt *yyyymm*_01_TR.csv	Tick-by-tick data file for Equity Index Futures/Options (e.g. Hang Seng Index Futures) for the trading month *yyyymm* (e.g. 200304 for April 2003)
*yyyymm*_01_MP.txt *yyyymm*_01_MP.csv	Product master file for Equity Index Futures/Options
*yyyymm*_01_MC.txt *yyyymm*_01_MC.csv	Contract master file for Equity Index Futures/Options
After-Hours Trading Session	
*yyyymm*_01_TR_AHT.txt *yyyymm*_01_TR_AHT.csv	Tick-by-tick data file of After-Hours Trading Session for Equity Index Futures/Options (e.g. Hang Seng Index Futures) for the trading month *yyyymm* (e.g. 201305 for May 2013) (Available from April 2013)
*yyyymmdd*_01_TR_AHT.txt *yyyymmdd*_01_TR_AHT.csv (last trading day of the previous month)	Tick-by-tick data file of After-Hours Trading Session for Equity Index Futures/Options (e.g. Hang Seng Index Futures) for the last trading day of the previous month *yyyymmdd* (e.g. 20130430 for 30 April 2013) (Available from May 2013)
*yyyymmdd*_01_MP.txt	Product master file for Equity Index Futures/Options

*yyyymmdd*_01_MP.csv (last trading day of the previous month)	for the last trading day of the previous month (for After-Hours Trading Session) (Available from May 2013)
*yyyymmdd*_01_MC.txt *yyyymmdd*_01_MC.csv (last trading day of the previous month)	Contract master file for Equity Index Futures/Options for the last trading day of the previous month (for After-Hours Trading Session) (Available from May 2013)

(Daily File)

File name	Contents
Day Trading Session	
*yyyymmdd*_01_TR.txt *yyyymmdd*_01_TR.csv	Tick-by-tick data file for Equity Index Futures/Options (e.g. Hang Seng Index Futures) for the trading day *yyyymmdd* (e.g. 20130702 for 2 July 2013)
*yyyymmdd*_01_MP.txt *yyyymmdd*_01_MP.csv	Product master file for Equity Index Futures/Options
*yyyymmdd*_01_MC.txt *yyyymmdd*_01_MC.csv	Contract master file for Equity Index Futures/Options
After-Hours Trading Session	
*yyyymmdd*_01_TR_AHT.txt *yyyymmdd*_01_TR_AHT.csv (previous trading day)	Tick-by-tick data file of After-Hours Trading Session for Equity Index Futures/Options (e.g. Hang Seng Index Futures) for the previous trading day *yyyymmdd* (e.g. 20130702 for 2 July 2013)
*yyyymmdd*_01_MP.txt *yyyymmdd*_01_MP.csv (previous trading day)	Product master file for Equity Index Futures/Options for the previous trading day (for After Hours Trading Session)
*yyyymmdd*_01_MC.txt *yyyymmdd*_01_MC.csv (previous trading day)	Contract master file for Equity Index Futures/Options for the previous trading day (for After Hours Trading Session)

1. Tick-by-tick data file

Item no.	Field name	Layout	Description
1	CLASS_CODE	Character 6 bytes	Unique identifier assigned to the product class, such as "HSI" for Hang Seng Index
2	FUT_OPT	Character 1 bytes	To indicate if "Futures" or "Options" "F" – Futures "O' – Options
3	EXPIRY_MTH	Character 4 bytes	Expiry month of the contract. Format is YYMM where YY – last 2 digit of the year MM – month For example, "0311" stands for November 2003
4	STRIKE_PRC	Numeric 17 bytes Picture is 9(8).9(8)	Exercise price (or strike price) for "Options" contracts only Zero for "Futures" contracts
5	CALL_PUT	Character 1 bytes	"Call" / "Put" type for "Options" contracts "C" – Call Options "P" – Put Options " " – Futures
6	DATE	Character 8 bytes	Date of the trading day Format is YYYYMMDD where YYYY – year MM – month DD – day
7	TIME	Character 6 bytes	Transaction timestamp Format is HHMMSS where HH – hour MM – minute SS – second
8	PRICE	Numeric 17 bytes Picture is 9(8).9(8)	Traded price of the transaction
9	QUANTITY	Numeric 8 bytes Picture is 9(8)	Number of contracts traded in the transaction

Item no.	Field name	Layout	Description
10	TRADE_TYPE	Character 3 bytes	000 – 002 : Normal trade 003 – 006 : Block trade 007 : Standard combination - order matching 020 : Delta Hedge (Trade in pre-market opening) 032 – 035 : Bulletin board trade 037 : Non-standard combination 134 : Standard combo trade

Total data length 71 bytes

2. Product master file

Item no.	Field name	Layout	Description
1	CLASS_CODE	Character 6 bytes	Unique identifier assigned to the product class
2	FUT_OPT	Character 1 bytes	To indicate if "Futures" or "Options" "F" - Futures "O' - Options
3	DATE	Character 8 bytes	Reference date for the product details provided in this record. Format is YYYYMMDD where YYYY - year MM - month DD - day
4	PROD_NAME	Character 50 bytes	Name of the derivatives product class. Normally the name of the underlying stock.
5	DATE_FROM	Character 8 bytes	Launch date of the derivatives product Format is YYYYMMDD BLANK for class codes generated as the result of capital adjustment of the underlying stock.
6	DATE_TO	Character 8 bytes	Last trading date of the derivatives product. BLANK for active products.
7	EX_STYLE	Character 1 byte	Exercise style of the derivatives product "A" - American "E" - European
8	CURRENCY	Character 3 bytes	▪ Currency of the multiplier if it is a dollar amount; OR ▪ Trading currency of the underlying stock if the multiplier is not a dollar amount "HK " - Hong Kong Dollars "US " - US Dollars "YN " - Japanese Yen "WO " - Korean Won "NT " - New Taiwan Dollar
9	MULTIPLIER	Numeric 17 bytes Picture is 9(8).9(8)	The standard contract size in the number of underlying shares

Total data length 102 bytes

3. Contract master file

Item no.	Field name	Layout	Description
1	CLASS_CODE	Character 6 bytes	Unique identifier assigned to the product class
2	FUT_OPT	Character 1 bytes	To indicate if "Futures" or "Options" "F" - Futures "O' - Options
3	EXPIRY_MTH	Character 4 bytes	Expiry month of the contract. Format is YYMM where YY - last 2 digit of the year MM - month For example, "0311" stands for November 2003
4	STRIKE_PRC	Numeric 17 bytes Picture is 9(8).9(8)	Exercise price (or strike price) for "Options" contracts only Zero for "Futures" contracts
5	CALL_PUT	Character 1 bytes	"Call" / "Put" type for "Options" contracts "C" - Call Options "P" - Put Options " " - Futures
6	DATE	Character 8 bytes	Reference date for the contract details provided in this record. Format is YYYYMMDD where YYYY - year MM - month DD - day
7	EXPIRY_DATE	Character 8 bytes	Expiry date of the contract Format is YYYYMMDD
8	CON_SIZE	Numeric 17 bytes Picture is 9(8).9(8)	Number of underlying shares represented by a contract
9	DATE_FROM	Character 8 bytes	First trading date of the contract Format is YYYYMMDD
10	DATE_TO	Character 8 bytes	Last trading date of the contract Format is YYYYMMDD
11	Filler	Character 20 bytes	Reserved field

Total data length 98 bytes