

# ICE Trade Capture solution: Workflow example

## Workflow description:

1. FIXEdge connects to ICE on start and maintains connection handling session-level reconnect, sequence gaps, etc.
2. Client application connects to FIXEdge via TIB or any other middleware.
3. Client sends Security Definition Request messages to FIXEdge and FIXEdge passes them to ICE,
4. ICE responds with Security Definition messages which are stored in the database and passed by FIXEdge back to client application.
5. Client sends Trade Capture Report Request messages to FIXEdge and FIXEdge passes them to ICE.
6. ICE responds with Trade Capture Report Request Ack and Trade Capture Report messages. These messages are stored in the database and passed back to client application.
7. FIXEdge notifies client application about ICE session status (via Email messages), so client application can re-subscribe to Security Definition or/and Trade Capture Report messages.
8. FIXEdge passes News messages which are sent by ICE to client application without any subscriptions.

## Examples of FIX messages:

### Security Definition Request (MsgType = 'c') from client application:

8=FIX.4.49=10635=c49=ClientAppID56=ICE34=250=ClientAppSubID52=20090609-19:06:51320=0000001321=348=20461=OXXXXX10=072

### Security Definition (MsgType = 'd') from ICE:

8=FIX.4.49=278835=d49=ICE56=ClientAppID34=257=ClientAppSubID52=20090609-19:07:07320=0000001322=11479323=4711=7311=780096309=CC  
FMZ0009!305=8463=OXXXXX542=20091106436=10307=Cocoa Futures - NYCC -  
Dec09998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10149202=Dec099300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780149309=CC  
FMU0010!305=8463=OXXXXX542=20100806436=10307=Cocoa Futures - NYCC -  
Sep10998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10709202=Sep109300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780086309=CC  
FMU0009!305=8463=OXXXXX542=20090807436=10307=Cocoa Futures - NYCC -  
Sep09998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10119202=Sep099300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780137309=CC  
FMN0010!305=8463=OXXXXX542=20100604436=10307=Cocoa Futures - NYCC -  
Jul10998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10689202=Jul109300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780076309=CC  
FMN0009!305=8463=OXXXXX542=20090605436=10307=Cocoa Futures - NYCC -  
Jul09998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10099202=Jul099300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780125309=CC  
FMK0010!305=8463=OXXXXX542=20100401436=10307=Cocoa Futures - NYCC -  
May10998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10669202=May109300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=5000311=780113309=CC  
FMH0010!305=8463=OXXXXX542=20100205436=10307=Cocoa Futures - NYCC -  
Mar10998=mt9013=1.09014=1.09017=109024=19030=19031=19032=1.09061=5789062=Cocoa  
Futures9083=09084=09085=monthly9091=Cocoa9092=19093=09094=1.09095=Futures9100=USD9101=USD  
/ mt9200=129201=10649202=Mar109300=7279301=NYCC  
(Cocoa)9302=NYCC9400=509401=14509402=500015=USD67=182=1393=710=076

### Trade Capture Report Request (MsgType = 'AD') from client application:

8=FIX.4.49=13535=AD49=ClientAppID56=ICE34=350=ClientAppSubID52=20090609-19:07:17568=0000001569=0263=1580=175=2009060360=20090603-04:00:0010=238

### Trade Capture Report Request Ack (MsgType = 'AQ') from ICE:

8=FIX.4.49=10235=AQ49=ICE56=ClientAppID34=357=ClientAppSubID52=20090609-19:07:27568=0000001569=0749=0750=010=200

### Trade Capture Report (MsgType = 'AE') from ICE:

8=FIX.4.49=51135=AE49=ICE56=ClientAppID34=457=ClientAppSubID52=20090609-19:07:37571=986487=0856=0568=0000001828=017=20000118439=2570=N55=21793248=BRN  
FMN0009!22=8461=FXXXXX916=20090701917=2009073132=201.031=66.2175=2009060360=20090603-18:02:36.678552=154=237=1300496411=877209086453=7448=client\_gui1447=D452=11448=Client Company  
Inc.447=D452=13448=ClientAppID447=D452=56448=999447=D452=4448=CLA999447=D452=51448=ICE Test447=D452=60448=S447=D452=5458=130048459018=2019022=110=118