

```

////////// API //////////

// Captures all Hive connection info

class HiveStreamingEndPoint {
    public HiveStreamingEndPoint(String nameNodeUri, String metaStoreUri
                                , String database, String table
                                , Map<String,String> partitionSpec)
}

// Streaming Writer Class

class StreamingWriter {
    public enum TxState { NOT_ACTIVE, OPEN, COMMITTED, ABORTED }

    public StreamingWriter(HiveStreamingEndPoint hiveEndPoint)
        throws ConnectionError;

    public void close();

    // Transaction Support //
    public void fetchTransactionBatch(int batchCountHint)
        throws ConnectionError;

    public boolean beginNextTransaction() throws InvalidTrasactionState;

    public void commit() throws InvalidTrasactionState;

    public void abort() throws InvalidTrasactionState;

    public TxState getTransactionState();

    public int remainingTransactions();

    // Write Data //
    public void write(byte[] record)
        throws ConnectionError, InvalidTrasactionState;
    public void write(Collection<byte[]> records)
        throws ConnectionError, InvalidTrasactionState;

}

*** StreamingWriter(HiveStreamingEndPoint hiveEndPoint)
Opens a connection to the hiveEndPoint

```

**\*\*\* fetchTransactionBatch(int batchCountHint) throws ...**

Acquires a new batch of transactions from Hive.

BatchCount is a hint from client indicating how many batches client needs

**\*\*\* beginNextTransaction(...) throws ...**

Switch to the next transaction in the batch.

returns false if there are no more transactions.

**\*\*\* commit()**

Commits the currently open transaction.

**\*\*\* abort() throws ...**

Aborts the currently open transaction.

**\*\*\* write(byte[] record)**

Write a record.

**\*\*\* write(Collection<byte[]> records)**

Write multiple records

**\*\*\* getTransactionState()**

Get the current state of the transaction

**\*\*\* remainingTransactions()**

Get a count of the unused transactions in the batch acquired by the last call to nextTransactionBatch.

**\*\*\* close()**

Close any open connections and resources.

```
///// Simple Use case – write data indefinitely /////
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```
Map<String, String> partInfo = new HashMap<String,String>();  
partInfo.put("country", "USA");  
partInfo.put("city", "San Jose");
```

```
HiveStreamingEndPoint hiveEP  
    = new HiveStreamingEndPoint("namenode:123/path"  
                                , "metstore:4567", "db_name", "table_name"  
                                , partInfo );
```

```
StreamingWriter writer = new StreamingWriter(hiveEP);  
int batchSize = 1000;  
while(keepGoing) {  
    try {  
        if(writer.remainingTransactionCount()==0) {  
            writer.fetchTransactionBatch(batchSizeHint);  
        }  
        writer.beginNextTransaction();  
        for(int i = 0; i<batchSize; ++i) {  
            byte[] record = /* read Data from somewhere */;  
            writer.write(record);  
        }  
        writer.commit();  
    } catch( Whatever e) {  
        writer.abort();  
    }  
}  
writer.close();
```