Events Java Threads (events-java-threads) TODO

* For a while at least, compare the query results with grep results.
* (!) td from:’…’ to:’…’ is surreptitiously translated to from:’…’ OR to:’…’ which is what we don’t want.
* **We lose empty lines in the raw representation.** We stop parsing a JavaThreadDumpEvent when we get “JNI global references” or the “Heap” marker, and thus we drop the lines at the bottom of the JavaThreadDumpEvent. We should refactor and keep adding lines to the current JavaThreadDumpEvent until we find the next timesamp, at which time we wrap up the current one.
* **Negating a Query.** Negating a query is a problematic concept to implement. Instead of negating the query, evaluate it and then negate the result. Get rid of negation the first time I need to implement negate() on any remaining queries.
* **QueryOnce**. Get rid of QueryOnce – it bit me once with MixedQuery and negated FieldQuery.
* td categories: determines the thread categories and provides counts for how many threads in each category are identified, per thread dump.
* On-line help and NOKB Manual: It should be reassuring to use. td | td –help | td help should display enough help to understand how to use the tools. For more complex subjects, it should send to NOKB.
* Make “Count” a TextOutputProcedure, the way the standard Output is. This way, I take advantage of “format”?
* **Query Semantics in Presence of Hierarchical Events.**
  + Define the semantics of a query in presence of compound events. This is what stops me now from running something like:  
      
    td ‘http’ ./stack-trace.txt   
      
    and only seeing the stack traces that match the regular expression.   
      
    Once I implement that, I can use it for analysis.
  + Presence of query: querying compound events, we probably need an extension of the Query API.
* **Format instances thread safety**. Remove public static final SimpleDateFormat and other Formats everywhere, and replace them with static method that create the instances on demand. We need to do this because Format instances are not thread safe. See io.novaordis.events.api.event.DateProperty. getDefaultDateFormat() as example.
* Sort the thread dump alphabetically by the thread name.