‘Using Clinical Enhanced Claims Data to Guide Treatment of Acute Heart Failure’ Project

Phase 1 Pharmacy Data Collection

The purpose of phase 1 is to establish the data specifications and formats as well as operational protocols for the collection of pharmacy data from the participating hospitals. As such the data required for evaluation does not need to include patient identifiable information. The data does however; need to identify all pharmacy orders pertaining to each inpatient admission as well as chronological information to be able to track the sequencing of the orders and relationship of orders to other events such as surgery.

The following indicates the hospital, patient and drug level data that will be needed to perform the phase 1 evaluation tasks.

**Hospital Level Data/Information**

1. Data dictionaries to interpret hospital internal codes for drugs, route of administration, frequency/timing of administration.
2. Drug data dictionary should include at a minimum, internal drug code, drug name, strength and any external code/classification such as NDC, RxNorm or SNOMED CT if they are being used.
3. Explanation of how the following situations are identified or handled
   a. Do they send informational messages through their pharmacy system as orders? If so, how can these be identified in the data?
   b. How are PRN and One Time orders identified
   c. Are medications the patient may be taking from home identified? If so, how and can these be provided.
   d. How are order cancellations, changes and discontinuations identified in their orders?
   e. How are orders identified that may be composed of multiple drugs and/or with diluents such as dextrose and NaCl. Can the actual strength of the base drug be identified in the order?

**Patient Level Data**

1. Provide between 6 to 12 months of all inpatient discharges excluding newborns
2. Hospital identifier
3. Record identifier sufficient to identify a specific discharge and all associated drug orders.
4. All date fields should be translated into a day of stay (date of admission = day 0)
5. Discharge Day
6. All ICD-9 Diagnoses Codes (principal and secondary) from associated claims data
7. All ICD-9 Procedure codes and day from associated claims
8. Patient age should be flagged according to the following groups
a. <18 Years
b. 18-29 Years
c. By subsequent decades up to age 89
d. >89 Years

**Drug Orders**

1. All drug orders for the inpatient discharges provided containing the following data at a minimum:
   a. Internal drug code
   b. Drug name
   c. Start and stop dates (translated to day from admission) and times
   d. Duration of order – if identified separately from start/stop dates
   e. Order identifier sufficient to identify updates to orders (change, cancellation, discontinuation etc.)
   f. Order type (e.g. new, change, cancel, discontinue). If internal code is used for type, also provide a data dictionary with descriptions of meaning
   g. Drug strength/unit (if unit values are not standard, please provide data dictionary with descriptions)
   h. Drug dosage (give amount)
   i. Interval (frequency) code and timing
   j. Route of administration code