NATIONAL PBM COMMUNICATION · April 2, 2009

Caraco Pharmaceutical Laboratories, Ltd. Announces a Nationwide Voluntary Recall of All Lots of Digoxin Tablets Due to Size Variability

- Caraco Pharmaceutical Laboratories, Ltd. is voluntarily recalling all tablets of Caraco brand Digoxin 0.125 mg, and Digoxin, 0.25 mg, distributed prior to March 31, 2009, which are not expired and are within the expiration date of September 2011.
- This is a CONSUMER level recall.
- The tablets are being recalled because they may contain more or less of the active ingredient than specified. This could cause patients to receive more or less of the medication than prescribed to treat heart failure or cardiac arrhythmias.
- Digoxin has a narrow therapeutic index and therefore may increase the risk for toxicity if more medication is taken, especially in patients with renal failure.
- Digoxin toxicity can result in nausea, vomiting, dizziness, low blood pressure, cardiac instability, bradycardia, or visual disturbances. Death can also result from excessive digoxin intake. If the patient receives lower doses than intended, this may result in lack of efficacy including cardiac instability.
- Caraco Digoxin 0.125 mg is a scored round biconvex yellow tablet imprinted with "437".
- Caraco Digoxin 0.25 mg is a scored round biconvex white tablet imprinted with "441".
- The following products are being recalled:

Product Description	NDC	Lot Numbers
Digoxin Tablets, USP, 0.125 mg	57664-437-88 (100-count) 57664-437-18 (1000-count)	ALL, distributed prior to March 31, 2009, which are not expired and are within the expiration date of September 2011
Digoxin Tablets, USP, 0.25 mg	57664-441-88 (100-count) 57664-441-18 (1000-count)	ALL, distributed prior to March 31, 2009, which are not expired and are within the expiration date of September 2011

- Return all remaining product at the facility/CMOP level with the affected lot number to McKesson, NOT as instructed in the product recall documents. Please inform your Facility Recall Coordinator when completed.
- Ensure that all appropriate providers receive the Provider Letter (attached).
- Determine whether the affected medication (information provided above) was dispensed to any patient(s). It is recommended to use a 12-month time frame for this determination. CMOP data will be provided by a CMOP representative to Pharmacy Chiefs.
- If an affected product was dispensed to patients, then:
  - Identify the patient(s).
  - Contact patient(s) who may have received the affected product by any appropriate method.
    - A sample letter can be found at: http://vaww.national.cmop.va.gov/PBM/Other%20Documents%20and%20Resources/Recall%20Patient%20Letter%20Template.doc.
    - This template can be altered according to site-specific needs.
  - Provide patient(s) with instructions on the following:
    - How to obtain a new supply of medication.
    - How to return the medication being recalled to the pharmacy.
    - To continue taking the medication with the affected lot number until they receive a new supply of digoxin. When correct medication is received, patient should begin taking the new medication and return the recalled supply as instructed.
    - Include a warning that states:
      "Symptoms of too much digoxin may include nausea, vomiting, dizziness, low blood pressure, slow heartbeat, or visual disturbances (including blurred vision, halos, or color changes). Symptoms of a lower amount of digoxin than usual could result in an increase in shortness of breath or faster heart rate. Patient(s), family members, or caretakers should call the patient's Healthcare Provider and/or seek care immediately if the patient who is receiving digoxin feels any of these symptoms."
- Report any adverse reactions experienced with the use of this medication to the VA ADERS program.
- Refer to http://www.fda.gov/oc/po/firmrecalls/caraco03_09.htmlfor further details regarding this recall.

ACTIONS:

- ***Facility Director*** *(or physician designee): Report completion of actions to the VISN Director.*
- ***Facility COS:*** *Forward this document to all appropriate providers who prescribe this agent (e.g.,* ***primary care providers, cardiologists, and internal medicine specialists,*** *including contract providers, etc.). In addition, forward to the Associate Chief of Staff (ACOS) for Research and Development (R&D). Forward to other VA employees as deemed appropriate. Report completion of actions to the Facility Director.*
- ***ACOS for R&D:*** *Forward this document to Principal Investigators (PIs) who have authority to practice at the facility and to your respective Institutional Review Board (IRB).*
- ***VISN Directors:*** *Within 10 business days of receipt (due 04/16/2009), communicate to PBM/VAMedSAFE that all actions have been completed via the Feedback tool: http://vaww.national.cmop.va.gov/PBM/visn_drug_recalls_alerts/default.aspx.*

Department of Veterans Affairs
Veterans Health Administration

April 2, 2009

Dear VA Healthcare Provider:

This is to inform you that Caraco Pharmaceutical Laboratories, Ltd. is voluntarily recalling all tablets of **Caraco brand digoxin 0.125 mg, and digoxin, 0.25 mg**, distributed prior to March 31, 2009, which are not expired and are within the expiration date of September, 2011, to the consumer level. The tablets are being recalled because they may contain more or less of the active ingredient than specified. This could cause patients to receive more or less of the medication than prescribed to treat heart failure or cardiac arrhythmias. Digoxin has a narrow therapeutic index and therefore may increase the risk for toxicity if more medication is taken, especially in patients with renal failure. Digoxin toxicity can result in nausea, vomiting, dizziness, low blood pressure, cardiac instability, bradycardia, or visual disturbances. Death can also result from excessive digoxin intake. If the patient receives lower doses than intended, this may result in lack of efficacy including cardiac instability (http://www.fda.gov/oc/po/firmrecalls/caraco03_09.html).

In September 2007, Caraco Pharmaceutical Laboratories, Ltd. was awarded a VA National Contract for digoxin tablets, providing VA with a single generic product (this is known as a "sole source" generic contract). Digoxin is considered a narrow therapeutic index drug, and a sole source generic contract minimizes switching patients from one generic formulation to another. The VA is currently in the process of procuring another sole source digoxin product. In the meantime, patients receiving digoxin have the potential for being switched from one generic digoxin to another. While variation is likely to be minimal between these approved generic products (those with AB ratings), it is important to note that generic products are compared to the original branded product (i.e., Lanoxin®) to establish bioequivalence; generics are not tested for bioequivalence compared to each other. Providers should consider potential variations between products, though as stated this is likely to be minimal, when evaluating patient response or potential toxicity to digoxin. To learn more about generic products, go to http://www.fda.gov/buyonlineguide/generic_equivalence.htm.

Patients are being notified of the recall and informed how to obtain a new supply of digoxin. They are also being instructed to contact their provider if they are experiencing symptoms of digoxin toxicity or lack of efficacy. If you have concerns regarding the safety or efficacy of patients who have been taking the Caraco digoxin or after they have been switched to another digoxin product, a serum digoxin level should be determined and the patient evaluated for symptoms of toxicity or loss of therapeutic effect.

If adverse events develop, providers are asked to report these via their Pharmacy Service or by using local protocols designated by their P&T Committee. These adverse events are subsequently entered into the VA's Adverse Drug Event Reporting System (VA ADERS) at https://medora.va.gov/adr and also reported to the FDA's MedWatch program.

If you have any questions or concerns regarding this information, please contact the pharmacy at your facility.

Sincerely,