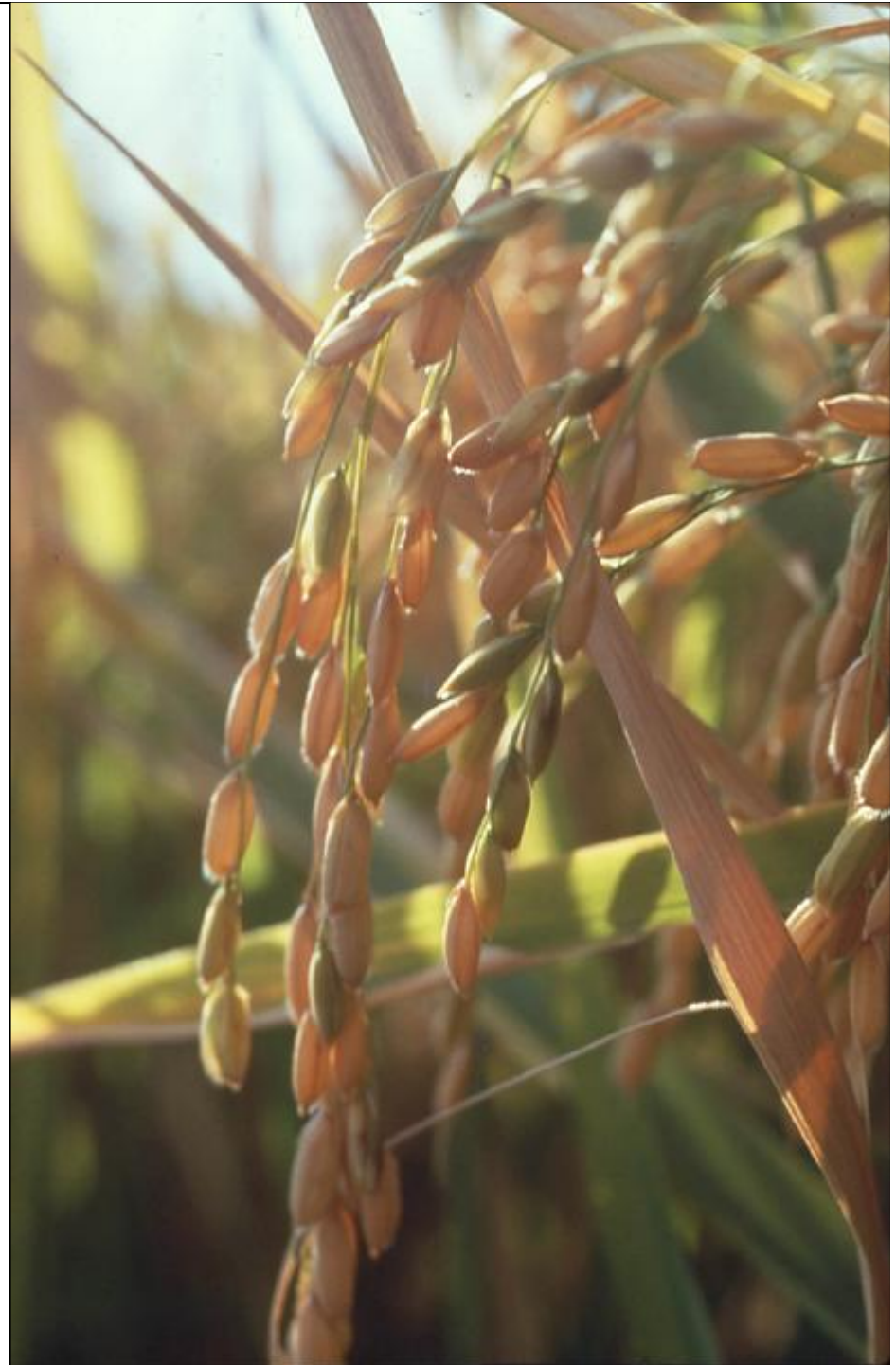




**Louisiana
Agricultural Technology
& Management
Conference**

**Randy Jemison
Director, Louisiana Field Services
USA Rice Federation**

**February 14, 2013
Marksville, LA**



USA Rice Responds to Arsenic Challenge



WHAT WE TESTED Our analysis found varying levels of arsenic in more than 60 rices and rice products—cereals, crackers, and more.

Arsenic in your food

Our findings show a real need for federal standards for this toxin

ORGANIC RICE baby cereal, rice breakfast cereals, brown rice, white rice—new tests by CONSUMER REPORTS have found that those and other types of rice products on grocery shelves contain arsenic, many at worrisome levels.

Arsenic not only is a potent human carcinogen but also can set up children for other health problems in later life.

Following our January investigation that found arsenic in apple and grape juices, we recently tested more than 200 samples of a host of rice products. They included iconic labels and store brands, organic products and conventional ones; some were aimed at the booming gluten-free market.

The results of our tests were even more troubling in some ways than our findings for juice. In virtually every product tested, we found measurable amounts of total arsenic in its two forms. We found significant levels of inorganic arsenic, which is a carcinogen, in almost every product category, along with organic arsenic, which is less toxic but still of concern. Moreover,

the foods we checked are popular staples, eaten by adults and children alike.

Though rice isn't the only dietary source of arsenic—some vegetables, fruits, and even water can harbor it—the Environmental Protection Agency assumes there is actually no “safe” level of exposure to inorganic arsenic.

No federal limit exists for arsenic in most foods, but the standard for drinking water is 10 parts per billion (ppb). Keep in mind: That level is twice the 5 ppb that the EPA originally proposed and that New Jersey actually established. Using the 5-ppb standard in our study, we found that a single serving of some rices could give an average adult almost one and a half times the inorganic arsenic he or she would get from a whole day's consumption of water, about 1 liter.

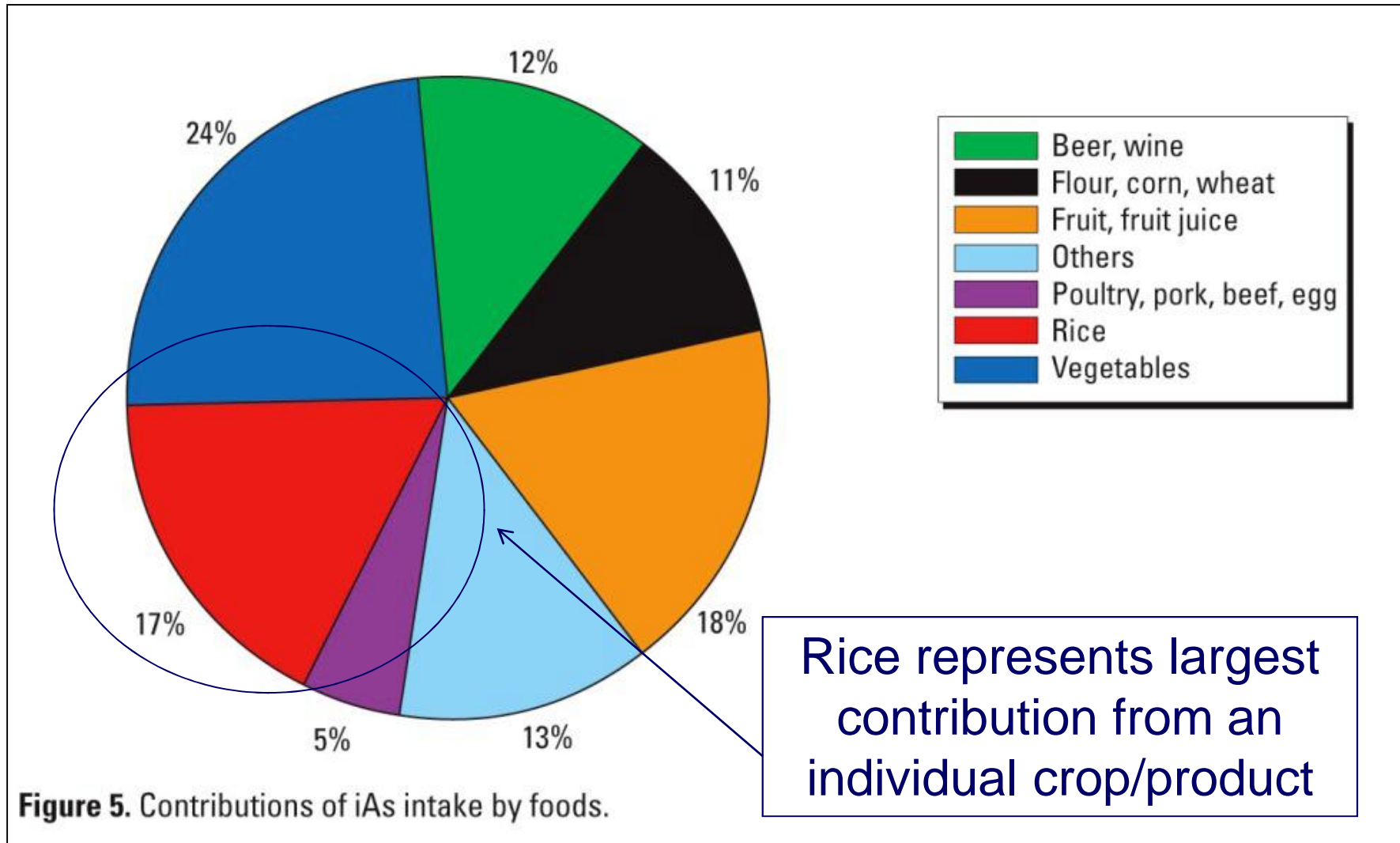
We also discovered that some infant rice cereals, which are often a baby's first solid food, had levels of inorganic arsenic at least five times more than has been found in alternatives such as oatmeal. Given our findings, we suggest limiting the consumption of rice products. Use our chart

and recommendations on page 25.

Our study was a snapshot of the market, with many products purchased in the New York metropolitan area and online, to gauge the extent of arsenic's presence in everyday foods. It can't be used for overall conclusions about specific brands. Still, we found important trends:

- White rice grown in Arkansas, Louisiana, Missouri, and Texas, which account for 76 percent of domestic rice, generally had higher levels of total arsenic and inorganic arsenic in our tests than rice samples from elsewhere.
- Within any single brand of rice we tested, the average total and inorganic arsenic levels were always higher for brown rice than for white.
- People who ate rice had arsenic levels that were 44 percent greater than those who had not, according to our analysis of federal health data. And certain ethnic groups were more highly affected, including Mexicans, other Hispanics, and a broad category that includes Asians.
- Reducing arsenic in food is feasible. We examined the efforts of two food compa-

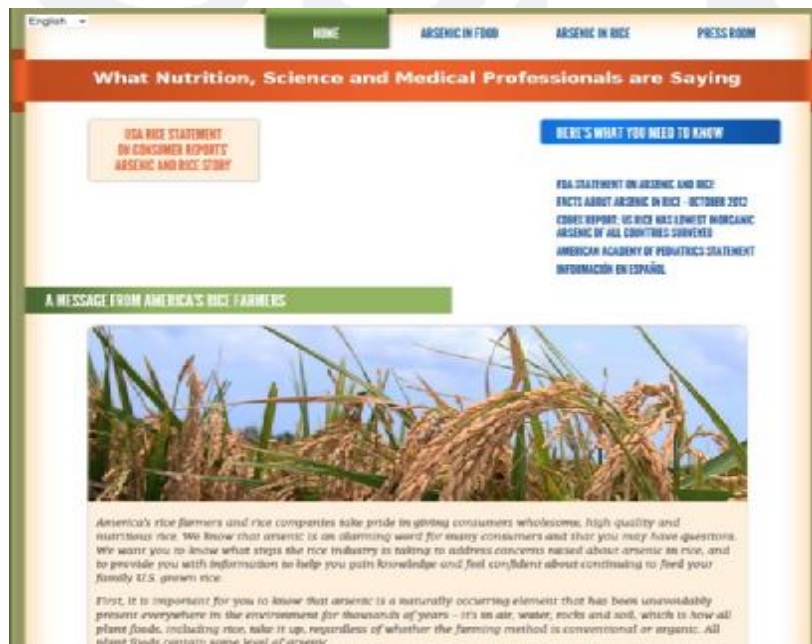
Arsenic Contribution by Foods



Source: EPA

USA Rice Website Traffic

- 36 Million Impressions
- 100,000 Unique Visitors
- 500 Media with USA Rice messaging



The infographic is titled 'THINK YOU KNOW ARSENIC?' and features the tagline 'Think Again.' It is divided into three main sections:

- ARSENIC FACTS:** States that people are exposed to **TRACE AMOUNTS OF ARSENIC EVERY DAY**. It lists that arsenic is found in **AIR**, **WATER**, and **ROCKS & SOIL**.
- PLANTS & SOIL:** Explains that trace amounts of arsenic are unavoidably present in various foods and beverages, whether grown using conventional or organic farming methods.
- THE MAKINGS OF A HEALTHY PLATE:** Cites the U.S. Environmental Protection Agency, stating that total **FOOD ARSENIC EXPOSURE THROUGH DIET IS 80% LOWER** than that determined to be safe in drinking water. It notes that diets rich in fruits, vegetables, and whole grains are highly beneficial to the **HEALTH OF CONSUMERS**.

Additional text in the infographic includes: 'Under FDA's ongoing monitoring programs, it is made aware of the level of naturally occurring substance, including arsenic, in foods.' and 'Sampling to date has not indicated a health or safety concern at these low levels. (Source: U.S. Food and Drug Administration)'.

Fallout from *Consumer Reports* Story

- Reps. DeLauro, Lowey, Pallone introduce legislation to set levels for arsenic in rice/rice products (Sept. 21)
- Requests for data from House Energy & Commerce Committee to rice companies
- South Korea temporarily suspended imports of U.S.-grown rice



The screenshot shows a webpage for Congresswoman Rosa DeLauro. The main headline is "DeLauro, Pallone, Lowey Introduce Legislation To Limit Arsenic In Rice". The article is dated Friday, September 21, 2012, and is titled "New Consumer Reports Study Highlights Need for Federal Action". The text of the article states: "WASHINGTON, DC—Representatives Rosa DeLauro (D-CT), Frank Pallone (D-NJ) and Nita Lowey (D-NY) announced they will introduce legislation today to limit the amount of arsenic permitted in rice and rice-based products. A recent *Consumer Reports* investigation revealed alarmingly high levels of arsenic in rice and rice-based products, such as cereal. There are currently no federal standards for arsenic in most foods, including rice and rice-based products." The article includes two quotes: one from DeLauro stating that high levels of arsenic are "absolutely outrageous" and that the federal government has an obligation to protect the food supply, and one from Pallone stating that the recent *Consumer Reports* findings are a cause for concern for consumers and parents. The webpage also features a "RELATED LINKS" section with links to "Press Releases", "Archived News", "Photo Gallery", and "Audio Library". A "STAY INFORMED" section includes a sign-up form for the latest news and information, with fields for "E-mail" and "Zip". A "Explore the 3rd District" section includes a map of the district.

FDA Action and Timeline



- **Sampling, Testing, and Data Collection (End of 2012)**
 - 1,200 rice and rice product samples.
 - Results to help inform risk assessment process.
- **Quantitative Risk Assessment (Likely end of 2013)**
 - Develop risk profiles to evaluate rice consumption across different age, ethnic groups.
 - Industry research needed to inform FDA process and international standards process (CODEX).
- **Risk Management/Action Levels (TBD)**
 - Set levels of allowable arsenic content in rice (for subgroups).
- **Implementation Timeline (TBD)**

Industry Research Helps FDA Process



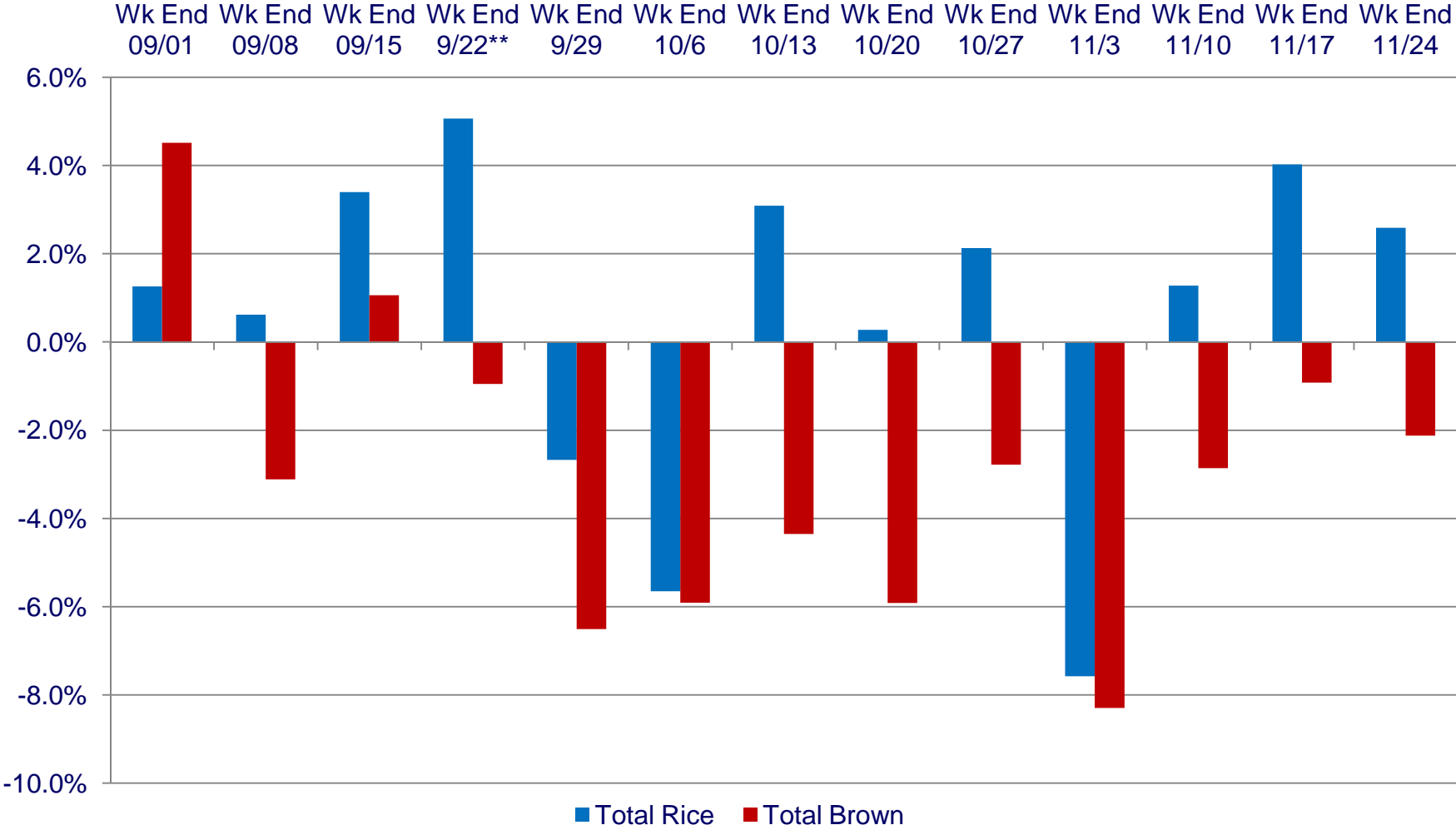
- Human Health Risk from Arsenic Exposure
- Net risk/benefit analysis of rice consumption and health/nutrition impacts
- Agronomic/Cultural Practices
- Processing, Milling Practices
- Varietal Differences/Development



Domestic Market Impact



Year-Over-Year Change in Rice Sales by Week - All Outlets Combined*



* Source: AC Nielsen: (XAO, Food, Wal-Mart, Club, Dollar, Military.)

** Week of Arsenic article release

Working with Key Partners



- International Food Information Council
- International Life Sciences Institute
- Dietitians/Health Professionals
- Members
- Customers

A screenshot of the Food Insight website. The header features the "FOOD INSIGHT" logo with the tagline "YOUR NUTRITION AND FOOD SAFETY RESOURCE". To the right of the logo are several icons representing different food categories: a globe, a farm, a person eating, a shopping cart, a cooking pot, and a fork and knife. Below the header is a navigation menu with links for "About", "News Room", "Hot Topics", "Blog", "Newsletter", "FoodInsightTV", "Resources", "For Professionals", "For Consumers", and "Store". The main content area displays an article titled "Arsenic and Our Food: The Facts" dated September 19, 2012. The article text discusses arsenic in the food supply, mentioning the FDA and the safety of a balanced diet. Below the text is a graphic titled "ARSENIC IN FOOD: WHAT YOU SHOULD KNOW" which includes a sub-section "FACTS ABOUT ARSENIC" and icons for "AIR" and "WATER". To the right of the article is a "Blog" section with several article teasers, including "Wholesome Goodness in School Meals: Whole Grains on School Lunch Trays", "National Diabetes Month --Three Easy Ways to Help Manage your Blood Sugar", "How Whole Grains Can Help With Weight Management Through the Holiday Season and Beyond", and "What you Need to Know to 'Be Safe' at Thanksgiving".

USA Rice Responds to Arsenic Challenge



Thank You

For more information visit:

<http://arsenicfacts.usarice.com/>