CLENBUTEROL - CONTAMINATED MEAT HITS CHINA, MEXICO AND SPORTS

Clenbuterol, a fat-burning drug that is used as a feed additive in pigs and other animals, returned to the spotlight in recent months with a new ban in China, an outbreak in Mexico, and possible contamination from meat purchased in Spain that caused the temporary suspension of a world champion cyclist.

Used to produce leaner or higher muscle-to-fat ratio in meat products, Clenbuterol has been banned in meat in the U.S. since 1991 and in the EU since 1996 because of health concerns including increased heart rate, muscular tremors, headache, nausea, fever and chills. In most cases these symptoms are reversible.1

IN CHINA

The government banned the production, use and sale of Clenbuterol tablets on September 30, 2011, in order to improve food safety.2 The ban was announced shortly after the arrest of 989 people in a crackdown triggered by incidents of Clenbuterol-tainted pork that sickened hundreds of people in March 2011.3

During the crackdown, 2.5 metric tons of Clenbuterol and 5.9 metric tons of meat containing Clenbuterol were confiscated. China’s Ministry of Agriculture (MOA) subsequently reported that 99.3 percent of the meat products analyzed during the second quarter were free of the drug, indicating the success of the effort.4

IN MEXICO

Here Clenbuterol has been banned in meat products for a number of years, the drug was found in the urine of 109 soccer players from multiple countries who were participating in the under-17 world soccer championship in June/July 2011. Clenbuterol is banned by the World Anti-Doping Agency, the International Olympic Committee and other sporting organizations because of its muscle-building properties,5 but the athletes in the June incident as well as an earlier suspension of five Mexican players blamed Clenbuterol-tainted beef for the findings.6

Over the next several months, government inspectors in Mexico shut down 14 livestock markets where 99% of 6,421 meat samples tested positive for the drug. Previous enforcement of the ban had reduced the frequency of Clenbuterol contamination from 555 incidents in 2005 to 89 in 2010.7

IN FRANCE

Clenbuterol hit the headlines in September 2010 when Spain’s cycling hero Alberto Contador tested positive for the drug as he biked toward his third victory in the prestigious Tour de France race and was suspended from cycling pending investigation. He blamed the problem on a steak that his chef purchased from Spain. He was subsequently cleared by the Spanish cycling federation but the case was appealed to the Court of Arbitration for Sport with a decision expected in the first few weeks of 2012.8

Contador’s defense was buttressed by a study by the German Sports University Lab in Cologne finding that humans can inadvertently ingest Clenbuterol from meat.9 However, no traces of the drug were found in more than 19,000 animal samples tested in Spain between 2008 and 2009, and only one positive was found among 83,000 samples tested in the EU during the same period.10

BACK IN CHINA

Concerns are now being raised that Clenbuterol contamination may not be limited to beef and pork. In October 2011, the government found that sheep feed in one province was found tainted with Clenbuterol.11

SGS laboratories can perform testing for Clenbuterol by various methods GC/MS, LC-MS/MS and ELISA methods at a level <1 part per billion (ppb) or lower.

For more details on SGS Food services visit: www.sgs.com/foodsafety.

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