OriGene Technologies Inc.

9620 Medical Center Drive, Ste 200
Rockville, MD 20850
UNITED STATES
Phone: +1-858-888-7900
Fax: +1-858-888-7904
US-info@acris-antibodies.com

OriGene EU

Acris Antibodies GmbH
Schillerstr. 5
32052 Herford
GERMANY
Phone: +49-5221-34606-0
Fax: +49-5221-34606-11
info@acris-antibodies.com

Monoclonal Antibody to Zearalenone - Ascites

Catalog No.: AM10233SU-N

Quantity: 0.2 ml

Background: Zearalenone, also known as F-2 mycotoxin or RAL, is an estrogenic resorcylic acid lactone compound produced by members of the filamentous fungi family, most of which live in soil and are associated with plants. While several species of filamentous fungi are harmless, some produce toxic substances that, if present in large amounts, can harm livestock, poultry and food crops. Zearalenone, a heat-stable compound, is one of the toxins secreted by filamentous fungi and is found throughout the world in a variety of crops, including rice, oats, corn, wheat and barely. In addition to its negative effect on soil, Zearalenone is the primary cause of breeding problems, such as abortion and infertility, in livestock. Before harvesting, crops are commonly tested for levels of Zearalenone, so as to avoid food-born contamination.

Host / Isotype: Mouse / IgG1

Clone: 11C9

Immunogen: BSA-Zearalenone

Format:
State: Lyophilized powder
Preservatives: None
Reconstitution: Restore in distilled water.

Applications:
ELISA: 1/2000-1/10000.
Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user.

Specificity: Reacts with Fusarium Zearalenone mycotoxin.

Storage:
Store lyophilized antibody at -20°C
Store reconstituted antibody at 2-8°C for one month or (in aliquots) at -20°C for longer.
Avoid repeated freezing and thawing.
Shelf life: one year from despatch.

General Readings:
1. Malekinejad H, Schoevers EJ, Daemen IJ, Zijlstra C, Colenbrander B, Fink-Gremmels J, et al. Exposure of oocytes to the Fusarium toxins zearalenone and deoxynivalenol causes aneuploidy and abnormal embryo development in pigs. Biol Reprod. 2007 Nov;77(5):840-7. Epub 2007 Jul 25. PubMed PMID: 17652666.
2. Adejumo TO, Hettwer U, Karlovsky P. Survey of maize from south-western Nigeria for zearalenone, alpha- and beta-zearalenols, fumonisin B1 and enniatins produced by Fusarium species. Food Addit Contam. 2007 Sep;24(9):993-1000. PubMed PMID: 17691013.
3. Cramer B, Bretz M, Humpf HU. Stable isotope dilution analysis of the fusarium mycotoxin zearalenone. J Agric Food Chem. 2007 Oct 17;55(21):8353-8. Epub 2007 Sep 20. PubMed PMID: 17880160.
4. Pfeiffer E, Heyting A, Metzler M. Novel oxidative metabolites of the mycoestrogen

zearalenone in vitro. Mol Nutr Food Res. 2007 Jul;51(7):867-71. PubMed PMID: 17579896.
5. Sabater-Vilar M, Malekinejad H, Selman MH, van der Doelen MA, Fink-Gremmels J. In vitro assessment of adsorbents aiming to prevent deoxynivalenol and zearalenone mycotoxicoses. Mycopathologia. 2007 Feb;163(2):81-90. Epub 2007 Feb 10. PubMed PMID: 17294292.
6. Yang, J.Y., Wang, G.X., Liu, J.L., Fan, J.J. and Cui, S. 2007. Toxic effects of zearalenone and its derivatives α-zearalenol on male reproductive system in mice. Reprod. Toxicol. 24: 381-387.
7. Ben Salah-Abbès, J., Abbès, S., Houas, Z., Abdel-Wahhab, M.A. and Oueslati, R. 2008. Zearalenone induces immunotoxicity in mice: possible protective effects of radish extract (Raphanus sativus). J. Pharm. Pharmacol. 60: 761-770.
8. Chen F, Ma Y, Xue C, Ma J, Xie Q, Wang G, et al. The combination of deoxynivalenol and zearalenone at permitted feed concentrations causes serious physiological effects in young pigs. J Vet Sci. 2008 Mar;9(1):39-44. PubMed PMID: 18296887.