European Food Safety Authority

EFSA Journal 2012;10(1):2538

SCIENTIFIC OPINION

Guidance for the preparation of dossiers for additives already authorised for use in food[1†]

EFSA Panel on Additives and Products or Substances used in Animal Feed (FEEDAP)[2,3]

European Food Safety Authority (EFSA), Parma, Italy

This guidance document follows the structure and definitions of Regulation (EC) No 1831/2003 and its implementing rules (Regulation (EC) No 429/2008). It is intended to assist the applicant in the preparation and the presentation of its application, as foreseen in Article 7.6 of Regulation (EC) No 1831/2003. This document does not substitute for the obligation of an applicant to comply with the requirements of Regulation (EC) No 1831/2003 and its implementing rules.

Dossiers for additives already authorised as food additives or approved as components of foodstuffs in the European Union and intended for use as a feed additive should follow the respective guidance documents for the feed additive categories to which they are assigned (technological, sensory, nutritional and zootechnical additives). However, the "simplified procedure" foreseen in Article 7 of Regulation (EC) No 1831/2003 for additives already authorised for use in food allows some extrapolations and consequently exemptions from the requirements laid out in the EFSA guidance documents. These exemptions are detailed here.

The full text of the authorisation as food additive or approval as a food component should be attached to the dossier.

[1] On request from EFSA, Question No EFSA-Q-2011-01095, adopted on 14 December 2011.

[†] This guidance document replaces the previous EFSA Guidance for the preparation of dossiers for additives already authorised for use in food, adopted in September 2008 (EFSA-Q-2008-404). The following sections have been updated: 3.1, 3.3 and 4.

[2] Panel members: Gabriele Aquilina, Georges Bories, Andrew Chesson, Pier Sandro Cocconcelli, Joop de Knecht, Noël Albert Dierick, Mikolaj Antoni Gralak, Jürgen Gropp, Ingrid Halle, Christer Hogstrand, Reinhard Kroker, Lubomir Leng, Secundino López Puente, Anne-Katrine Lundebye Haldorsen, Alberto Mantovani, Giovanna Martelli, Miklós Mézes, Derek Renshaw, Maria Saarela, Kristen Sejrsen and Johannes Westendorf. Correspondence: FEEDAP@efsa.europa.eu

[3] Acknowledgement: The Panel wishes to thank the members of the Working Group on Guidance for the preparatory work on this scientific opinion.

Suggested citation: EFSA Panel on Additives and Products or Substances used in Animal Feed (FEEDAP); Guidance for the preparation of dossiers for additives already authorised for use in food. EFSA Journal 2012;10(1):2538. [4 pp.] doi:10.2903/j.efsa.2012.2538. Available online: www.efsa.europa.eu/efsajournal

1 SECTION I: SUMMARY OF THE DOSSIER

The guidance for the specific category of additive should be followed.

2 SECTION II: IDENTITY, CHARACTERISATION AND CONDITIONS OF USE OF THE ADDITIVE; METHODS OF ANALYSIS.

The additive has to be fully identified and characterised. The studies described in this section must be based on the final product(s) for which authorisation as feed additive is sought. Where differences between food and feed additive formulations exist, these should be documented and the implications for the assessment of the feed additive described.

The guidance for the specific category of additive should be followed.

3 SECTION III: STUDIES CONCERNING THE SAFETY OF THE ADDITIVE

Where the additive has already been assessed for safety for food use by a European scientific body, a copy of the most recent safety assessment and a summary of the safety studies submitted should be provided. This should be supplemented with any relevant data subsequently produced.

The elements required for the safety assessment as feed additive are described in the EFSA guidance documents for the categories of technological, sensory, nutritional and zootechnical additives.

3.1 Studies concerning the safety of use of the additive for the target animals.

If the use level of the feed additive is less than or similar to that used in food [expressed as quantity per metabolic body weight (usually mg/kg$^{0.75}$)], a tolerance study is normally not required.

Actual exposure can be calculated by multiplying the tabulated exposure (Table 1) with the intended feed concentration in mg/kg complete feed. These values should then be compared to the human exposure value, considering a metabolic body weight of 21.6 kg$^{0.75}$.

Table 1: Default values for body weight and feed intake and resulting target animal exposure per 1 mg feed additive/kg complete feed

Animal category	Body weight (kg)	Metabolic body weight (mbw) (kg$^{0.75}$)	Mean feed intake (g/day)	Target animal exposure (µg/mbw (kg^{075})/day)
Chickens for fattening	2	1.7	120	71
Turkeys for fattening	12	6.4	400	63
Laying hens	2	1.7	120	71
Piglets	20	9.5	1000	105
Pigs for fattening	100	31.6	3000	95
Sows	200	53.2	6000	113
Veal calves (milk replacer)	100	31.6	2000	63
Cattle for fattening	400	89.4	8000	89
Dairy cows	650	128.7	20000	155
Salmonids	2	1.7	40	24
Dogs	15	7.6	250	33
Cats	3	2.3	60	26

If the use level in feed is considerably higher than the corresponding use in food, then the maximum safe feed concentration could be derived from the lowest NOAEL (or by

benchmark dose procedure) of appropriate substance-specific toxicological studies,[4] applying an uncertainty factor of 100 and using the default values for body weight and feed intake in Table 1.

If safety for the target species cannot be established as above, then tolerance studies may be required. The requirements for tolerance studies given in the EFSA guidance documents for the different categories of additives should be followed. For details on how to perform and report tolerance studies, see the technical guidance on tolerance and efficacy studies in target animals.

3.2 Studies concerning the safety of use of the additive for consumers

Studies concerning the safety for the consumer are generally not required for those additives which are authorised as food additives or approved as components for foodstuffs in the European Union without any restriction. However, the following should be taken into consideration:

- **For food additives for which an acceptable daily intake (ADI) is not specified,**[5] assessment of the safety for consumers is not required, except when the use of the additive in feed leads to the exposure of the consumer to a different pattern of metabolites than when used in food. In which case further toxicological and residue data will be required.
- **For food additives with an established ADI or tolerable upper intake level (UL),** consumer safety must be assessed taking into consideration the additional exposure from feed use or specific exposure related to metabolites arising from the target species. This can be done by extrapolating residue data from literature.

  Where residue studies are necessary, the requirement is limited to a comparison of the residue levels in tissues and products from an untreated group to the group administered the highest dose of the additive proposed.
- **For food additives for which no ADI is allocated,**[6] the reasons why an ADI was not allocated should be clearly specified. If concerns arise from this, residue data (possibly extrapolated from literature) should be provided and used to calculate total consumer exposure. Where residue studies are necessary, the requirement is limited to a comparison of residue levels in tissues and products from an untreated group to the group administered the highest dose of the additive proposed. If the use of the additive in feed would contribute to a significant increase in consumer exposure, a full toxicological evaluation is required.

3.3 Studies concerning the safety of use of the additive for users/workers

If the assessment of an additive for use in food contains an assessment of user safety, then this should be provided. In such a case, additional data would not be required. Otherwise, the guidance for the specific category of additive should be followed.

3.4 Studies concerning the safety of use of the additive for the environment

The guidance for the specific category of additive should be followed.

4 SECTION IV: STUDIES CONCERNING THE EFFICACY OF THE ADDITIVE

Where the functions of the additive applied for feed use and described for food use are the same, no further demonstration of efficacy is generally necessary provided that the effect seen

[4] These should include at least a 90 day oral toxicity study.
[5] Without an explicit indication of the upper limit of intake, assigned to substances of very low toxicity.
[6] Applicable to substances for which the available information is not sufficient to establish their safety.

when used in food could reasonably be expected to be seen when used in feed at the recommended concentration and that food and feed matrices are of comparable nature.

Otherwise, the guidance for the specific category of additive should be followed.

5 SECTION V: POST-MARKET MONITORING PLAN

The guidance for the specific category of additive should be followed.