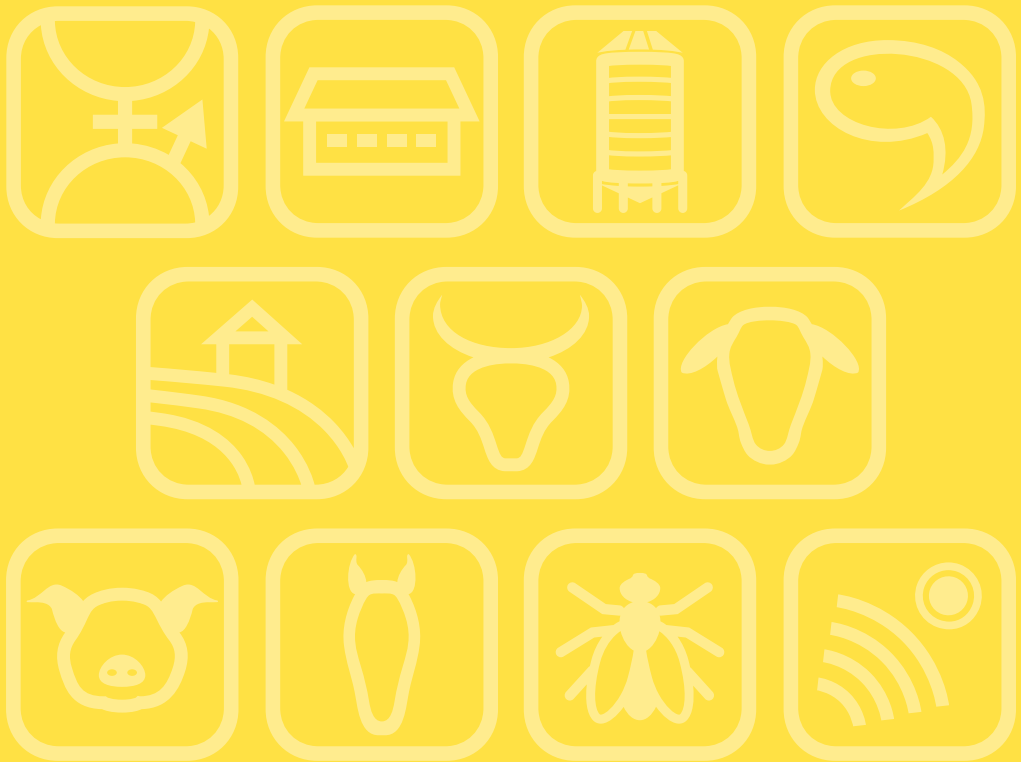


Book of Abstracts of the 69th Annual Meeting of the European Federation of Animal Science



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Dubrovnik, Croatia,
27-31 August 2018

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European Federation of Animal Science**



EAAP

European Federation of Animal Science

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Dubrovnik, Croatia, 27th – 31st August, 2018



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Welcome to Dubrovnik and Croatia

On behalf of the Croatian Organising Committee, we are pleased to invite you to attend the 69th Annual Meeting of the European Federation of Animal Science (EAAP). The meeting will be held in the Valamar Resort in Dubrovnik, one of the most prominent tourist destinations in the Mediterranean, from 27th to 31st August 2018.

For decades, the Annual Meeting has hosted scientists and experts from the field of animal science, not only from Europe but also from other countries around the globe. The EAAP Congress provides insights into the latest research results from many areas of animal science. It is a unique opportunity for industry and scientists to meet and acquire new knowledge as well as to exchange experience. Carried out through many sessions, presentations and discussions about scientific achievements in the European and world livestock production are also an opportunity for the application of new ideas in practice. Furthermore, there will be a focus on international research collaboration and knowledge exchange towards innovation. All these preferences make the EAAP one of the largest animal science congresses in the world – we expect approximately 1000 participants from more than 50 countries.

The main topic of the congress is 'Conventional and traditional livestock production systems – new challenges' and it includes sustainability, animal welfare, agroecology and product quality. The programme contains various disciplines and the latest findings regarding farm animals such as genetics, nutrition, management, health, welfare and physiology of cattle, sheep, goats, pigs, horses, poultry and fur animals, as well as the use of insects for feed and precision livestock farming..

We are delighted to invite you to participate in the 69th Annual Meeting of EAAP which focuses on translating research into animal production practice.

Assist. Prof. Zdravko Barać,
Chairman of the Organising Committee,
Croatian Agricultural Agency

Mr. Tomislav Tolušić,
Minister of Agriculture,
Patron of the 69th Annual Meeting

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- **Dr. Maja Dražić**, Croatian Agricultural Agency

Coccidiostatic effects of tannin rich diets in rabbit production

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The potential anticoccidial effect of tannin containing resources such as sainfoin and carob in rabbits feed given to does at pre-weaning and to growing rabbits were tested. The trial started at parturition (D0), 24 does and their litters were assigned into three groups. They were fed either with a control (Group CO), a carob (containing 10% carob pods meal) (Group RO) or a sainfoin diet (containing 34% dehydrated sainfoin pellets) (Group SA). All diets were made isonitrogenous and isoenergetic and also balanced for crude fibre, but differed by their tannins content. Weaning occurred at D37, and growing rabbits remained in the same cage until D51, and then were transferred to fattening cages until the end of the trial. Weight gain of young rabbits among the three groups did not differ. Economical FCR post-weaning was reduced for rabbits of group SA compared to CO and RO groups. Faecal oocyst count in group SA was 60% lower than in CO and RO groups. Areas under the curve (AUCs) for oocysts counts calculated when rabbits remained in maternity cages after weaning did not differ according to diet. AUCs calculated after rabbit transfer in fattening cage was 62% lower in group SA than in CO and RO groups. The main species identified (from D59 to D83) was *E. magna* (53% of oocysts). AUCs for *E. magna* did not differ between diets. In conclusion, incorporation of sainfoin in a balanced rabbit diet can lower oocyst excretion of coccidia by 60%, and ameliorated the economical FCR.

Milk metabolites are non-invasive biomarkers for nutritional and metabolic disorders of Dairy Herds?

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The interpretation of milk metabolites from milk recording can be indicative of nutritional and metabolic disorders. The nutrient imbalances as the relationship between carbohydrates fermentability and protein degradability in the rumen can be diagnosed by milk urea nitrogen (MUN), protein and relation of fat/protein (F/P) in milk. The metabolic imbalances, as the negative energy balance, hyperketonemia, ketosis and acidosis can be diagnosed by β -hydroxybutyrate (BHB), fat and the relation of F/P in milk. Thus, milk metabolites can be indicators of health and welfare of the cow. This study analysed 110,461 individual milk samples of 9,523 lactating dairy cows collected monthly from January 2015 to March 2017 from 27 herds of South of Portugal, with an official milk recording. The mean of lactating cows per herd was 353 \pm 270 (mean \pm SD) and milk production per cow was 35.08 \pm 9.80 kg/day. During the first 30 days of lactation 7.7% of milk recording had BHB concentration over 0.2 mmol/l, indicating that these cows had high possibility of being with clinical ketosis. 44.8% of milk recording had the relation of F/P over 1.4 and 49.3% had milk fat over 4.5% indicating that about 45% of the cows were probability mobilizing body fat. 86.7% of milk recording had MUN concentration between 101 and 299 mg/kg indicating that the relation between carbohydrates and protein of the diet was appropriate. On the other hand, 11.9% of milk recording had the relation of F/P above 1.4 and 21.6% had milk protein above 3% indicating that some animals are ingesting a small proportion of protein in the diet comparing with the quantity of carbohydrates. In conclusion, these non-invasive biomarkers can reflect nutritional and metabolic disorders, but the interrelation between them must be taken into account. The thresholds of this milk metabolites to indicate health disorders are not consensual among the authors.