



For Immediate Release

U.S. Poultry & Egg Association

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Researchers Evaluate the Effects of Variable Light Intensity Programs on Broiler Welfare

USPOULTRY and the USPOULTRY Foundation announce the completion of a funded research project at the University of Arkansas in which researchers evaluated the effects of variable light intensity programs on broiler welfare. The research was made possible in part by an endowing Foundation gift from Simmons Foods and proceeds from the International Poultry Expo, part of the International Production & Processing Expo (IPPE). The research is part of the Association's comprehensive research program encompassing all phases of poultry and egg production and processing. In total, \$35,700,000 has been invested in research by the Association and Foundation. A summary of the completed project is below.

Project #BRU014: Effect of Variable Light Intensity Program on Broiler Gait Score, Stress and Central Positive Welfare on a Commercial Broiler Farm

(Dr. David Caldwell, Department of Poultry Science, University of Arkansas, Fayetteville, Ark.)

Dr. David Caldwell, head of the Department of Poultry Science and the director for the Center of Excellence for Poultry Science within the University of Arkansas, and his team recently completed a funded research project. The goal of the project was to determine the effects of variable intensity lighting and natural lighting programs on behavior, gait score and stress hormone (corticosterone) compared with constant light intensity programs in commercial broiler farms. Other objectives in the study included investigating the effect of enrichment huts on broiler behavior, gait score and stress in the different lighting programs. Findings showed that the variable light (VL) intensity lighting program stimulated the dustbathing behavior and volunteer movement of birds. In addition, litter moisture content and footpad lesions were lowest in the VL intensity lighting program house.

The research [summary](#) can be found on the USPOULTRY website. Information on other Association research may also be obtained by visiting the USPOULTRY website, www.uspoultry.org.

About USPOULTRY

U.S. Poultry & Egg Association (USPOULTRY) is the All Feather Association progressively serving its poultry and egg members through research, education, communications and technical services. Founded in 1947, USPOULTRY is based in Tucker, Georgia.

About USPOULTRY Foundation

The USPOULTRY Foundation's mission is to support the recruitment and training of the brightest students, seek and fund scientific research, foster student scientists and promote careers in the poultry and egg industry.