ScienceDaily (Feb. 7, 2008) — The huge increase in growth rates of broiler chickens means more than a quarter of these intensively-reared birds have difficulty walking, according to a comprehensive survey carried out by the University of Bristol. The study identifies a range of management factors that could be altered to reduce leg health problems but warns that implementation of these changes would be likely to reduce growth rate and production.

A debate on the sustainability of current practice in the production of broiler chickens is urgently required, the researchers conclude.

Dr Toby Knowles of Bristol University's Division of Food Animal Science and colleagues assessed the walking ability of 51,000 chickens within 176 flocks. They also obtained information on approximately 150 different management factors associated with each flock. The study found that at an average age of 40 days, over 27.6 per cent of birds showed poor locomotion and 3.3 per cent were almost unable to walk. The high prevalence of poor locomotion occurred despite culling policies designed to remove severely lame birds from flocks.

Dr Knowles said: "Broiler chickens have been subjected to intense genetic selection. In the past 50 years, broiler growth rates have increased by over 300 per cent from 25 g per day to 100 g per day. "Our research shows that the primary risk factors associated with impaired locomotion and poor leg health are those specifically associated with rate of growth."

Other factors include the age of the bird, bird genotype, not feeding whole wheat, a shorter dark period during the day, higher stocking density, no use of antibiotic and the use of intact feed pellets.

Dr Knowles said: "The welfare implications of this study are profound. Worldwide approximately 20 billion broilers are reared within similar husbandry systems that are biased towards economics of production and detrimental to poultry welfare. "However, within the current framework there is variation in the magnitude of the problem between different flocks, and so some scope to improve walking ability through alterations in husbandry practice.

"Work needs to be carried out on the predictability of these risks, and the economics of improved welfare practices, for them to gain industry acceptance.

"Research shows that consumers currently know little about how broiler chickens are reared but can be shocked when presented with information about current commercial practices. Since the sustainability of intensive broiler production depends on continued consumer acceptance of the farming practices involved, the broiler industry will need to work with the scientific community to develop more robust and healthier genotypes and to ensure that optimal husbandry and management practices are fully implemented."

This study was funded by DEFRA and published in PLoS One on February 6.

http://www.plosone.org/doi/pone.0001545

Adapted from materials provided by Public Library of Science, via EurekAlert!, a service of AAAS.

Need to cite this story in your essay, paper, or report? Use one of the following formats:
Animal welfare groups protest as Tesco delivers riposte to celebrity chefs - the £1.99 chicken

Tesco was criticised last night by animal welfare groups for slashing the price of whole chickens to £1.99 in a special "bargain basement" offer which makes its birds the cheapest on the market.

The week-long special offer comes less than a month after a series of television programmes sparked a national debate about the conditions of intensively reared poultry.

The supermarket chain, the biggest in Britain, will announce today that it has doubled its orders for premium chicken, which means it will stock more free-range and organic chicken than before.

But at the same time it is cutting the price of standard birds from £3.30 to £1.99 "to ensure shoppers on a budget also benefit".

It claims this means that families will be able to sit down to roast chicken and all the trimmings for less than £1 per person.

The 1.4kg birds are on special offer through its stores and its home delivery service until Sunday.

A Channel 4 series into chicken production last month, presented by celebrity chefs Jamie Oliver and Hugh Fearnley-Whittingstall, highlighted the lives led by most supermarket chickens - 95% are reared intensively - before they reach the table. Oliver said most people expected to be able to buy a chicken for just £2.50 when it should be sold for at least £4.

Last night Dr Lesley Lambert, director of research at Compassion in World Farming, accused Tesco of driving down prices. She said: "Why doesn't Tesco drop their prices on their higher welfare products and make this affordable to people on all budgets? While Sainsbury's has committed to massive improvements in animal welfare, Tesco is showing its ethical credentials with this race to the bottom."

"Scientific research shows that many of these birds are lame and likely to be in pain and live their lives in their own faeces ... Consumers have shown they will vote with their wallets on the basis of animal welfare."

Tesco's media director, Jonathan Church, said: "We have been working hard for a while to increase the amount of higher welfare chicken we sell and the recent debate over chickens in the media has helped raise awareness of choice to customers."

Research due to be published today into the broiler industry, involving visits to five different UK producers, will highlight the poor conditions of broiler chickens.

The huge increase in growth rates of broiler chickens means more than a quarter of these intensively reared birds have difficulty walking, according to the survey, which was funded by the Department for Environment, Food and Rural Affairs and carried out at the University of Bristol.

Supermarket giant makes huge commitment

UK supermarket Sainsbury's have committed to improve the lives of 70 million chickens a year by moving away from stocking the most intensively farmed chickens. This is a huge step forward for animal welfare.

The supermarket giant has announced a move away from stocking poor welfare factory farmed chickens across its fresh and frozen meat bird range and will instead adopt Freedom Food standard or equivalent as the minimum.

"This will dramatically improve the lives of 70 million chickens every year and is one of the most significant moves in farm animal welfare in the UK."

Dr. Lesley Lambert, Compassion in World Farming Director of Food Policy Freedom Food or equivalent standards ensure more space, slower growing birds which have fewer welfare problems and environmental enrichment such as straw bales which allow for more natural behaviour.

By reaching the equivalent of Freedom Food standards, Sainsbury's is leading the way amongst the big four supermarkets on chicken welfare, joining M&S and Waitrose as pioneers in this area in the UK. We urge all consumers to support higher welfare for chickens through the power of their purse.