



THE WORKING CLUMBER SPANIEL SOCIETY

www.workingclumber.co.uk

Factsheet

HIP AND ELBOW DYSPLASIA - EBVs

GET THE FACTS



Clumber Spaniels are a rare and vulnerable breed with only around 200 puppies born each year.

Breeding strategies need to be thoughtful and well informed. There is a responsibility to act on facts rather than personal opinion.

The Working Clumber Spaniel Society is grateful for the ongoing guidance and support from both the Kennel Club and The Animal Health Trust who study and understand the breeding strategies appropriate to the breed and its small gene pool.

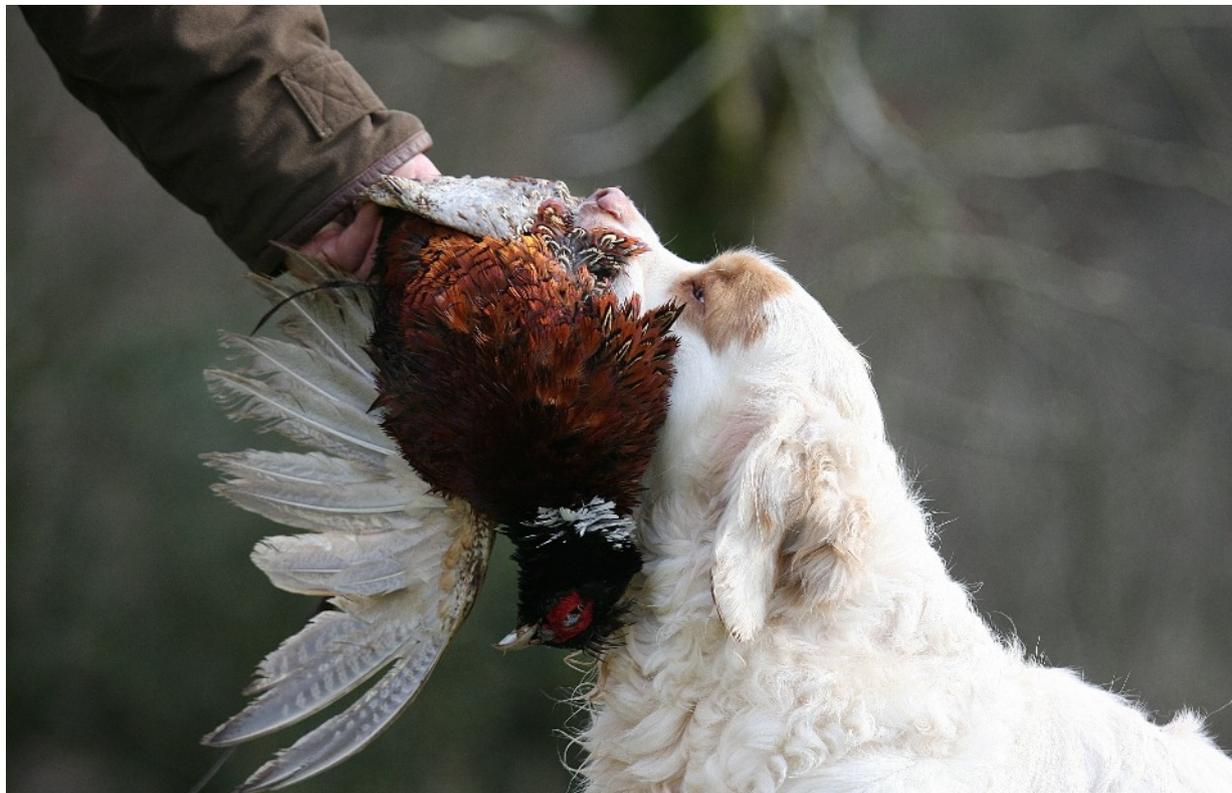
HIP AND ELBOW DYSPLASIA

The WCSS recommends that all dogs used for breeding are British Veterinary Association (BVA) hip and elbow scored by having the dog X-rayed. The BVA score gives a value for each hip, which added together gives the total actual hip dysplasia (HD) for the dog across 9 separate criteria. A score below the breed median (in 2018 this was 11) is excellent but a total below 25 is acceptable. Elbows should be zero.

However it should be noted that hip and elbow dysplasia are only partly genetic and can be greatly affected by environmental factors especially in puppyhood. In order to better determine how much an individual dog's hip dysplasia has been influenced by genetic rather than environmental factors we can also look at Estimated Breeding Values (EBV) for HD which are available on the Kennel Club website.

Hip dysplasia is caused by environmental factors more than genetic factors. Care must be taken of young pups to minimise environmental damage to developing bone and joints.

Consider using EBVs to gain more information on the hereditary elements influencing Hip Dysplasia.



See overleaf for information on Estimated Breeding values (EBVs)

ESTIMATED BREEDING VALUES (EBV) FOR HIP DYSPLASIA

EBVs give an estimate of a dog's, or a litter's level of inherited HD (without a BVA score necessarily being in place, although the confidence level of the EBV rises when a BVA score has been done). EBVs are only estimates, and they depend on BVA hip scores being in place for the dogs and their close relatives to be calculated with any degree of confidence. Each EBV rating comes with a percentage confidence rating which gives an indication of the amount of data that has been included in the calculation. The higher the EBV rating, the higher the risk of inherited hip dysplasia, so negative ratings are good, zero is the current breed median score, and a confidence rating over 70% should be sought.

For breeders, checking the EBV of both the proposed sire and dam and taking a mean average of these will give the EBV rating for the proposed litter, so that if one of the breeding partners has a higher BVA hip score than we would ideally like, partnering this dog with one with a compensating low EBV can still produce pups with a lower than average EBV. This means that greater flexibility can be used in selecting dogs for breeding with a higher than average EBV and therefore more dogs can be bred from, which of course is all good for genetic diversity.

More information on EBVs is available on the KC website here: www.thekennelclub.org.uk/about-ebvs

EBVs for elbow dysplasia will be available on the KC website sometime in the future.

ADVICE FOR PUPPY BUYERS

Check the EBV for both the sire and dam on the KC website (you will need to register on MyKC and know the KC registered name for both dogs). Take the mean average of these two values (ie sire score plus dam score and divide the total by 2) and this will give you the EBV for the litter. Ideally this should zero or a negative number, but try to avoid litters with a high positive value.

ENVIRONMENTAL FACTORS

A pup from good scoring parents is not guaranteed good hips but the environmental factors affecting hips and elbows can be minimised by ensuring a good diet for growing bones, ensuring your pup/dog does not get overweight, limiting exercise especially when very young, and discouraging jumping and going up and down stairs.