

Health Tests - Forms and Information

The PWDCA recommends that all health clearances be completed, current and entered into the Health & Litter Log (<http://hll.pwdca.org/>) for both Sire and Dam PRIOR to breeding.

For breeders and puppy buyers, it is recommended that you verify health information is current for the sire and dam at: www.OFA.org . Searches for parents may be done by using the registered name of each parent or the registration number.

Failure to complete all the recommended health screenings can result in offspring that are affected by GM-1, JDCM, prcd-PRA and/or EORPA, hip dysplasia and eye issues all of which may lead to a premature death, increased veterinary costs and/or decreased quality of life.

****Not previously producing an affected offspring and the parent not being affected in no way guarantees subsequent offspring produced will NOT be affected. Only the recommended health screenings can ensure it is not produced and passed to offspring.**

Recommended health screenings: These screenings are important to the health and longevity of our breed. When the <u>recommended</u> screenings and subsequent breedings are done per the PWDCA recommendations, puppies produced from those litters <u>will not</u> be affected by GM-1, JDCM, prcd-PRA and EORPA. Health screenings for hip dysplasia and eye issues can decrease the likelihood of these occurring in subsequent generations.						
	Hip Dysplasia	Canine Eye Certification Registry (CAER) (formerly CERF)	Progressive Retinal Atrophy (prcd-PRA)	Early Onset Progressive Retinal Atrophy (EORPA)	Juvenile Dilated Cardiomyopathy (JDCM)	GM-1 Storage Disease (Gangliosidosis)
Sire and/or Dam Required Testing	Both Sire and Dam	Both Sire and Dam	Both Sire and Dam	Either Sire or Dam	Either Sire or Dam	Either Sire or Dam
Testing Frequency	Radiographs required once 24 months or greater	Current within 12 months. Testing current prior to breeding up to 120 months	<u>Once</u> at any age prior to breeding or Cleared By Parentage (CBP) via DNA Analysis *see below	<u>Once</u> at any age prior to breeding or Cleared By Parentage (CBP) via DNA Analysis *see below	<u>Once</u> at any age prior to breeding or Cleared By Parentage (CBP) via DNA Analysis *see below	<u>Once</u> at any age prior to breeding or Cleared By Parentage (CBP) via DNA Analysis *see below
Results Required for Breeding	Both Sire and Dam have PASSING score of <ul style="list-style-type: none"> • Excellent • Good • Fair 	Both Sire and Dam have PASSING rating (up to the age of 120 months) *Frozen Semen litters see below	One parent must be "NORMAL" (non-carrier) or Cleared by Parentage (CBP) via DNA (see below)	One parent must be "NORMAL" (non-carrier) or Cleared by Parentage (CBP) via DNA (see below)	One parent must be "NORMAL" (non-carrier) or Cleared by Parentage (CBP) via DNA (see below)	One parent must be "NORMAL" (non-carrier) or Cleared by Parentage (CBP) via DNA (see below)

Testing Facilities	Radiographs performed by Veterinarian	Board Certified Ophthalmologist	Optigen	Optigen	PennGen	Optigen
Testing Website	https://www.ofa.org	https://www.ofa.org/diseases/eye-certification	http://www.optigen.com	http://www.optigen.com	https://www.vet.upenn.edu/research/academic-departments/clinical-sciences-advanced-medicine/research-labs-centers/penngen/penngen-tests	http://www.optigen.com
Testing Instructions	Radiographs submitted to OFA for review and grading	Follow instructions on the backside of the CAER exam results form. Submit to OFA.	Samples may be submitted to Optigen via cheek swab (acquired via Optigen) or blood sample taken by a veterinarian and then shipped. Visit "Order Test" portion of website for complete instructions.	Samples may be submitted to Optigen via cheek swab (acquired via Optigen) or blood sample taken by a veterinarian and then shipped. Visit "Order Test" portion of website for complete instructions.	Search by Breed and Test Samples may be submitted to PennGen via cheek swab (acquired via PennGen) or blood sample taken by a veterinarian and then shipped.	Samples may be submitted to Optigen via cheek swab (acquired via Optigen) or blood sample taken by a veterinarian and then shipped. Visit "Order Test" portion of website for complete instructions.
Submit all completed health screening certifications to the PWD Health and Litter Log (http://hll.pwdca.org)						

Optional health screenings: Optional health screenings are available to breeders and owners, but are not part of the recommended tests per the PWDCA. Doing these optional health screenings can be done in addition to the above recommended screenings, but they in no way replace or can be substituted for the recommended health screenings.

	Improper Coat (IC)	Elbow Dysplasia	Cardiac Evaluation	Autoimmune Thyroiditis	Sebaceous Adenitis	Patellar Luxation	Hip Dysplasia (PennHip)
Sire and/or Dam Desired Testing	Either Sire or Dam	Both Sire and Dam	No requirement	No requirement	No requirement	No requirement	No requirement
Testing Frequency	<u>Once</u> at any age prior to breeding	Radiographs taken at 24 months or greater	At or after 1 year of age	At or after 1 year of age	At or after 1 year of age	At or after 1 year of age	Minimum of 16 weeks of age

Results Desired for Breeding	One parent must test Normal so not to produce IC puppies	NORMAL	NORMAL by Auscultation or Ultrasound	NORMAL	NORMAL	NORMAL	Consult with a PennHip Veterinarian to discuss results
Testing Facilities	Optigen	Radiographs performed by veterinarian	Board certified cardiologist	Veterinarian and laboratory	Veterinarian and laboratory	Veterinarian	PennHip approved veterinarian
Testing Website	http://www.optigen.com	https://www.ofa.org/veterinarian/application-forms	https://www.ofa.org/veterinarian/application-forms	https://www.ofa.org/veterinarian/application-forms	https://www.ofa.org/veterinarian/application-forms	https://www.ofa.org/veterinarian/application-forms	https://info.antechimagingservices.com/pennhip/index.html
Testing Instructions	Samples may be submitted to Optigen via cheek swab (acquired via Optigen) or blood sample taken by a veterinarian and then shipped.	Radiographs submitted to OFA for review and grading	Submit form with results to OFA	Submit form with results to OFA	Submit form with results to OFA	Submit form with results to OFA	Submit PennHip results to OFA (optional)
Optional health screenings may also be submitted to the PWD Health and Litter Log (http://hll.pwdca.org)							

***Litters produced using FROZEN SEMEN: CAER Testing (OFA Eye Certification Registry-formerly CERF) –**

- (a) If Sire is alive, the CAER exam must be current at the time of breeding except where the Sire is over 120 months of age or the CAER or a CERF (Canine Eye Registration Foundation) was current on the date(s) of breeding.
- (b) If the Sire is deceased, the CAER or CERF exam status must have complied with the “then current” PWDCA health recommendations at the time of his death.

***Cleared by Parentage (CBP)-(only good for 1 generation if both parents have been tested and cleared)**

From the OFA Website:

That means that if both parents have been DNA tested clear for a disease, OFA will declare offspring clear by virtue of the fact that the parents tested clear. However, there are a few requirements to clear by parentage.

- 1.) *As mentioned, both sire and dam must have tested clear, and those test results must be on record with OFA.*
- 2.) *The sire, dam and the offspring to be cleared must all have been DNA identity profiled, and DNA profiles must be on record at OFA.*

Once those requirements are met, the owner of the offspring to be cleared will fill out the application for DNA Based Genetic Disease (available on the OFA website), writing “clear by parentage” in the blank line at the top of the form, and submit the form with the \$15 OFA processing fee. That’s it—your dog is now cleared by parentage for that disease.

The resulting certification will have a suffix of CBP, indicating that the dog itself was not tested and that the clearance is based on the sire and dam's test results. OFA will only clear by parentage for one generation, due to the possibility of new mutations or as yet undiscovered gene mutations.

For more information on CBP (Cleared by Parentage) visit: <https://www.ofa.org/clear-by-parentage>

To submit DNA FOR CLEARED BY PARENTAGE (CBP) Program, DNA needs to be submitted to and cleared by CHIC or AKC at and then submitted to OFA:

CHIC-http://www.caninehealthinfo.org/chic_dnabankapp_main.pdf

AKC- <https://shop.akc.org/products/akc-dna-test?variant=30519215236>

OFA (information on how to submit DNA results to achieve CBP status)- <https://www.ofa.org/clear-by-parentage>

CHIC (Canine Health Information Center)- A dog achieves CHIC Certification if it has been screened for every disease recommended by the parent club for that breed *and* those results are publicly available in the OFA database.

For more information on CHIC visit: <https://www.ofa.org/about/chic-program>

Other accepted DNA facilities (reviewed annually)

Test	Facility
GM-1 Gangliosidosis	ASAP Genetics (AUST)
GM-1 Gangliosidosis	Eurovetgene
GM-1 Gangliosidosis	HealthGene (Canada)
GM-1 Gangliosidosis	Laboklin
GM-1 Gangliosidosis	Optigen
GM-1 Gangliosidosis	Paw Prints Genetics
GM-1 Gangliosidosis	VetGen
Juvenile Dilated Cardiomyopathy (JDCM)	PennGEN
Progressive Retinal Atrophy (prcd PRA)	Genetic Technologies (AUST)
Progressive Retinal Atrophy (prcd PRA)	Optigen
Progressive Retinal Atrophy (prcd PRA)	Paw Print Genetics