## UNIVERSITY OF CALIFORNIA, DAVIS

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VETERINARY GENETICS LABORATORY SCHOOL OF VETERINARY MEDICINE ONE SHIELDS AVENUE DAVIS, CALIFORNIA 95616-8744

TELEPHONE: (530) 752-2211 FAX: (530) 752-3556



SANTA BARBARA . SANTA CRUZ

## AQHA GENETIC DISEASE PANEL TEST RESULTS

AMERICAN QUARTER HORSE ASSOCIATION P.O. BOX 200 AMARILLO, TX 79168-0001

Case:

QHA152775

Date Received:

04-Aug-2014

Print Date:

Reg: 5519507

06-Aug-2014

Report ID:

5421-2502-9157-7055

Verify report at www.vgl.ucdavis.edu/myvgl/verify.html

Horse: GUTHRIE CITY LIMITS

DOB: 01/01/2012

Breed: QH

Sex: S

Alt. ID:6451317

Sire: SIXES PICK

Reg: 3744428

Dam: JIM N NICKS DI

Reg: 5030388

GBED	N/N	N/N - Normal - Doe
HERDA	N/HRD	N/HRD - Carrier - h
НҮРР	N/N	N/N - Normal - Doe
МН	N/N	N/N - Normal - hors
PSSM1	N/N	N/N - Normal - hors

es not possess the disease-causing GBED gene

horse carries one copy of the HERDA gene

es not possess the disease-causing HYPP gene

se does not have the MH gene

se does not have the PSSM1 gene

GBED - Glycogen Branching Enzyme Deficiency. Fatal disease of newborn foals caused by defect in glycogen storage. Affects heart and skeletal muscles and brain. Inherited as recessive disease.

HERDA - Hereditary Equine Regional Dermal Asthenia. Skin disease characterized by hyperextensible skin, scarring, and severe lesions along the back of affected horses. Typical onset is around 2 years of age. Inherited as a recessive disease.

HYPP - Hyperkalemic Periodic Paralysis. Muscle disease caused by defect in sodium channel gene that causes involuntary muscle contraction and increased level of potassium in blood. Inherited as dominant disease. Two copies of defective gene produce more severe signs than one copy.

MH - Malignant Hyperthermia. Rare but life-threatening skeletal muscle disease triggered by exposure to volatile anesthetics (halothane), depolarizing muscle relaxants (succinylcholine), and stress. Presumed inheritance as dominant disease.

PSSM1 - Polysaccharide Storage Myopathy Type 1. Muscle disease characterized by accumulation of abnormal complex sugars in skeletal muscles. Signs include muscle pain, stiffness, skin twitching, sweating, weakness and reluctance to move. Inherited as a dominant disease.

GBED testing performed under a license agreement with the University of Minnesota.

HERDA testing performed under a license agreement with the University of California, Davis.

PSSM1 testing performed under a license agreement with the American Quarter Horse Association.

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## IMM AND MYH1 MYOPATHY (MYHM) GENETIC TEST REPORT

GLENN BLODGETT P.O. BOX 130 GUTHRIE, TX 79236 *Case:* NQ51864

Date Received: 25-Jul-2019

Print Date: 29-Jul-2019

**Report ID:** 9120-1212-6251-2051

Verify report at www.vgl.ucdavis.edu/myvgl/verify.htm

Name: GUTHRIE CITY LIMITS Reg: 5519507

DOB: 01/01/2012 Sex: Stallion Breed: Quarter Horse

IMM and MYH1 Myopathy N/My

1 copy of the MYHM mutation is present. Horse may develop IMM following infection or vaccination, or nonexertional rhabdomyolysis. Horse can pass on the mutation to 50% of offspring.

For more detailed information on MYHM test results, please go to: www.vgl.ucdavis.edu/services/horse/IMM.php