

Patient ID SA00140437	Patient Name VALIDATIONTESTING, GSH	Birth Date 1996-06-06	Gender F	Age 24
Order Number SA00140437	Client Order Number SA00140437	Ordering Physician CLIENT,CLIENT	Report Notes	
Account Information C7028846 DLMP Rochester		Collected 19 Nov 2020 12:00		

Glutathione, B

Result Name	Value	Unit	Reference Value	Performing Site
  Glutathione, B	5.0	mg/dL RBC	46.9–90.1	1 MCR

Glutathione levels are 7% of mean normal.

Measurement of reduced glutathione (GSH) is used as a surrogate for the activity of multiple enzymes that contribute to red blood cell GSH levels. Clinically significant deficiencies of these enzymes are typically associated with GSH levels <25% of mean normal. Heterozygotes usually show normal to mildly decreased GSH levels and are not clinically affected. Some common polymorphisms may result in mildly decreased GSH levels but are not associated with hemolysis. Riboflavin and selenium deficiency may decrease GSH levels that normalize after repletion.

Clinically significant deficiencies have been reported in multiple GSH enzymes and all are thought to have an autosomal recessive inheritance pattern. These include deficiencies in glutathione synthetase (GSS), g-glutamylcysteine synthetase (GCLC), and glutathione reductase (GSR). Less well-characterized are deficiencies in glutathione peroxidase and glutathione transferase.

Received: 20 Nov 2020 15:45

Reported: 20 Nov 2020 15:55

Laboratory Notes

- 1** This test was developed and its performance characteristics determined by Mayo Clinic in a manner consistent with CLIA requirements. This test has not been cleared or approved by the U.S. Food and Drug Administration.

Performing Site Legend

Code	Laboratory	Address	Lab Director	CLIA Certificate
MCR	Mayo Clinic Laboratories - Rochester Main Campus	200 First Street SW, Rochester, MN 55905	William G. Morice M.D. Ph.D	24D0404292