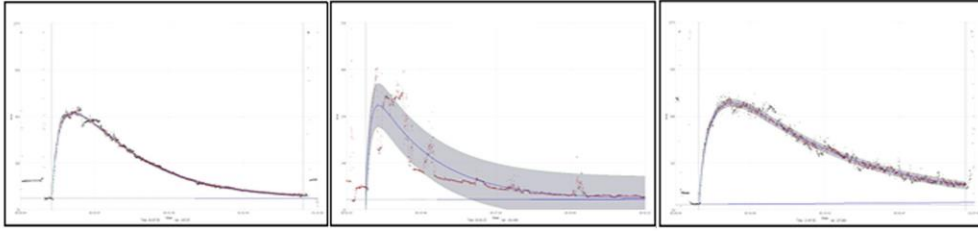
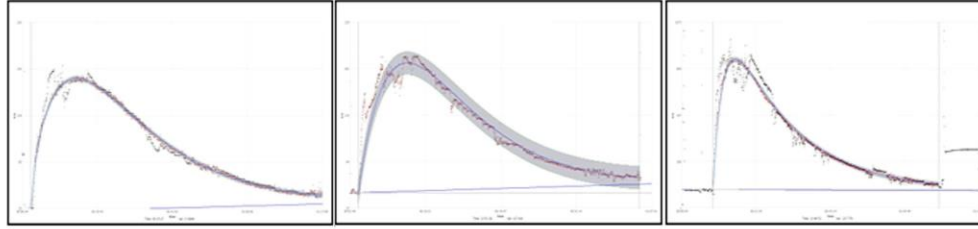
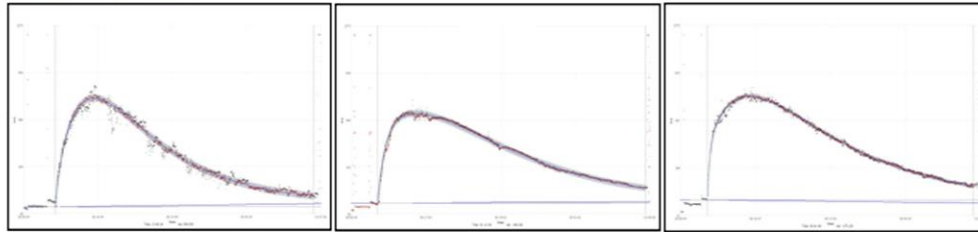
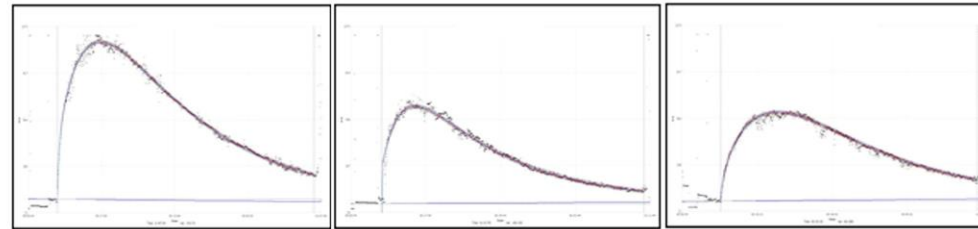
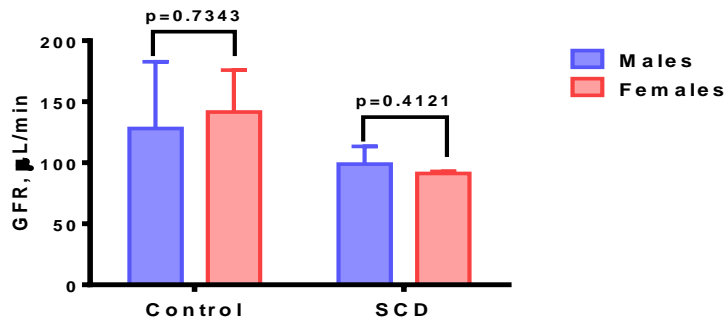
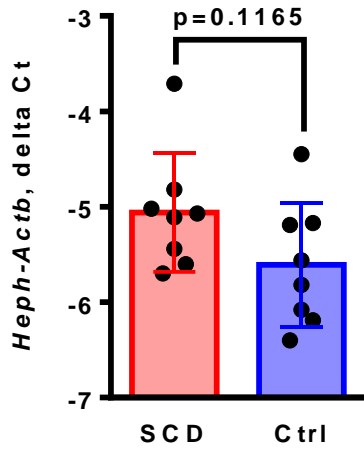


Supplemental Figure S1

Hematological parameters in male and female mice. No statistically significant differences are observed between male and female mice in the hematocrit (A), hemoglobin (B), red blood cells count (C), mean corpuscular volume (D), mean corpuscular hemoglobin (E) and reticulocytes (D) of the control and SCD mice. Blood and urine samples are collected from 3 males and 3 females in SCD and control groups. Hematological parameters are assessed using hematology counter Sysmex XN-1000 with C57BL/6 chip. Statistical analysis was performed using Prism 6.0 software (GraphPad). Data was analyzed using 2-way ANOVA with the Turkey post hoc test. Means and STD are shown in the graphs. $p < 0.05$ is considered significant.

A**Control males****Control females****SCD males****SCD females****B****Supplemental Figure S2**

GFR levels in male and female mice. No statistically significant differences are observed between male and female mice in the GFR values. (A) Raw data obtained from detection of sinistrin-FITC with fluorescent detector (MediBecon GmbH). (B) Quantification of GFR. 3 females and 3 males are used to in the control and SCD groups. Statistical analysis was performed using Prism 6.0 software (GraphPad). Data was analyzed using 2-way ANOVA with the Turkey post hoc test. Means and STD are shown in the graphs. $p < 0.05$ is considered significant.



Supplemental Figure S3.

Expression of renal hephaestin (Heph) is similar in SCD and control mice.

Real time RT-PCR of mRNA isolated from renal cortex.

Results are normalized to β -actin levels (*Actb*) and shown as delta Ct for mRNA. Means and STD are shown. Each dot represents a value obtained from an individual mouse. $p < 0.05$ is considered significant.

Fig. 2C TfR

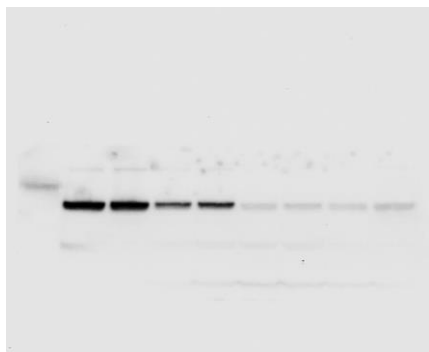


Fig.2C β -Actin

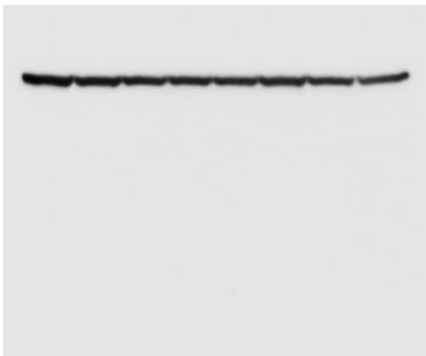


Fig. 2G FRTH

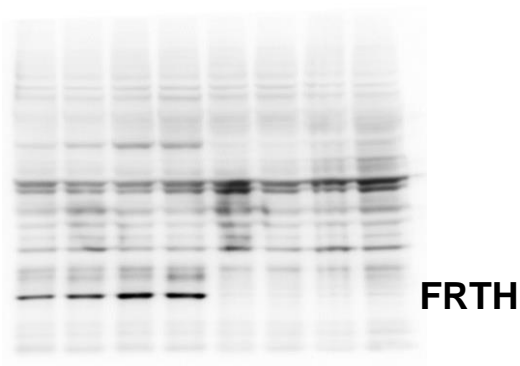


Fig.2G β -Actin



Fig.3B FPN

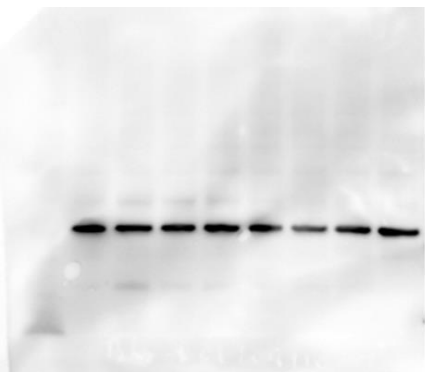


Fig. 3B β -Actin



Fig.3E CP and β -Actin

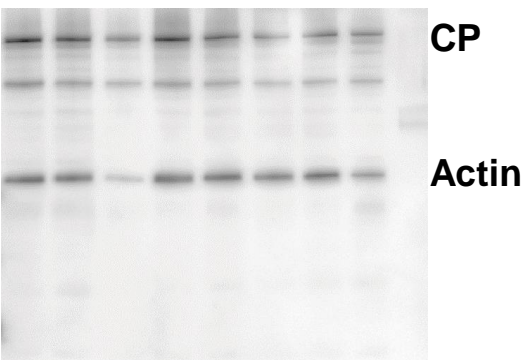


Fig. 3H FPN and β -Actin

