

Supplementary Table 1.

Tally of samples numbers for each outcome variable + number of outliers detected/excluded (Grubbs test)

Location/Test	Measure	WB-Sham		WB-Rad		G/6-Sham		G/6-Rad	
		Number of Samples Assessed	Outliers	Number of Samples Assessed	Outliers	Number of Samples Assessed	Outliers	Number of Samples Assessed	Outliers
Whole body	Body Mass	5		9		5		7	
Whole body	L. Soleus Mass	9		9		8		8	
Whole body	R. Soleus Mass	9		9		8		8	
Distal Femur	Percent Bone Volume (%)	5		8		5		8	
Distal Femur	Trabecular Thickness (mm)	5		8		5		8	
Distal Femur	Trabecular Number (#)	5		8		5		8	
L4 Spine	Percent Bone Volume (%)	8		7		8		8	
L4 Spine	Trabecular Thickness (mm)	8		7		8		8	
L4 Spine	Trabecular Number (#)	8		7		8		8	
Mid Shaft Femur 3 point bend	Ultimate Load (N)	5		8		5		7	1
Mid Shaft Femur 3 point bend	Stiffness (N/mm)	4	1	8		5		7	1
Mid Shaft Femur 3 point bend	Energy-to-Ultimate (mJ)	5		8		5		8	
Mid Shaft Femur 3 point bend	Energy-to-Fracture (mJ)	5		8		5		8	
Mid Shaft Femur 3 point bend	Post-yield Energy (mJ)	5		8		5		8	
Femoral Neck Compression Test	Ultimate Load (N)	7		8		7		7	
Femoral Neck Compression Test	Stiffness (N/mm)	7		8		7		7	
L4 Compression Test	Ultimate Load (N)	6		6		7		4	
L4 Compression Test	Stiffness (N/mm)	6		6		7		4	
Distal Femur	MS/BS (%)	6		5		8		4	
Distal Femur	MAR ($\mu\text{m}/\text{d}$)	6		5		8		4	
Distal Femur	BFR ($\mu\text{m}^3/\mu\text{m}^2/\text{y}$)	6		5		8		4	
Mid Shaft Tibia	Endocortical MS/BS (%)	4		7		5		7	
Mid Shaft Tibia	Periosteal MS/BS (%)	3	1	7		5		7	

