Supplemental Table 3. Partial correlations (controlled for energy intake) between BAP, TRAP5b, PTH, and amino acids at the endpoint of the study among healthy working-aged men that consumed diets that differed in the proportions of red meat and legumes for six weeks (all data combined, n=99-102). The meat group consumed 760 g of boneless and cooked red and processed meat per week corresponding 25% of the total protein intake. The legume group consumed legume-based products corresponding 20% of the total protein intake and 200 g of red and processed meat per week corresponding 5% of total protein intake.

		BAP (U/L)	TRAP5b (U/L)	PTH (ng/L)	Methionine intake (mg/kg/d)	Cysteine intake (mg/kg/d)	Threonine intake (mg/kg/d)	Alanine intake (mg/kg/d)	Asn/Asp intake (mg/kg/d)	Arginine intake (mg/kg/d)	Gln/Glu intake (mg/kg/d)	Glycine intake (mg/kg/d)	Histidine intake (mg/kg/d)	Isoleucine intake (mg/kg/d)	Leucine intake (mg/kg/d)	Lysine intake (mg/kg/d)	Phenylalanine intake (mg/kg/d)	Proline intake (mg/kg/d)	Serine intake (mg/kg/d)	Valine intake (mg/kg/d)	Tryptophan intake (mg/kg/d)	Tyrosine intake (mg/kg/d)
BAP	r	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
TRAP5b	r	0.370	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
PTH	r	0.188	-0.032	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.064	0.752	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Methionine	r	-0.066	0.019	-0.110	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.518	0.855	0.283	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Cysteine	r	0.029	0.100	-0.212	0.805	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.773	0.329	0.036	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Threonine	r	-0.005	0.094	-0.166	0.861	0.845	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.963	0.357	0.102	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Alanine	r	0.006	0.050	-0.130	0.900	0.887	0.951	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.954	0.627	0.203	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Arginine	r	0.051	0.147	-0.147	0.641	0.763	0.913	0.854	.	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.618	0.148	0.148	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.	.
Asn/Asp	r	0.012	0.111	-0.138	0.736	0.782	0.961	0.898	0.954	.	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.906	0.276	0.175	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.	.	.
Gln/Glu	r	0.012	0.157	-0.246	0.710	0.806	0.920	0.814	0.865	0.888	.	.	.	.	.	.	.	.	.	.	.	.
	P	0.909	0.123	0.015	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.	.
Glycine	r	0.070	0.076	-0.102	0.819	0.874	0.909	0.975	0.869	0.883	0.788	.	.	.	.	.	.	.	.	.	.	.
	P	0.491	0.460	0.320	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.	.
Histidine	r	-0.070	0.028	-0.166	0.950	0.841	0.936	0.951	0.770	0.841	0.822	0.888	.	.	.	.	.	.	.	.	.	.
	P	0.494	0.787	0.102	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.	.
Isoleucine	r	-0.010	0.113	-0.167	0.863	0.833	0.992	0.932	0.902	0.951	0.933	0.886	0.931	.	.	.	.	.	.	.	.	.
	P	0.923	0.266	0.101	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.	.
Leucine	r	-0.023	0.122	-0.185	0.843	0.810	0.982	0.902	0.891	0.943	0.949	0.851	0.915	0.994	.	.	.	.	.	.	.	.
	P	0.820	0.232	0.068	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.	.
Lysine	r	-0.055	0.039	-0.140	0.918	0.788	0.965	0.953	0.840	0.913	0.839	0.895	0.961	0.966	0.956	.	.	.	.	.	.	.
	P	0.592	0.703	0.170	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.	.
Phe	r	0.021	0.162	-0.199	0.738	0.796	0.959	0.852	0.926	0.955	0.964	0.819	0.841	0.968	0.977	0.891	.	.	.	.	.	.
	P	0.841	0.112	0.049	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.	.
Proline	r	-0.043	0.128	-0.243	0.679	0.671	0.830	0.683	0.725	0.778	0.944	0.625	0.755	0.862	0.898	0.776	0.902	.	.	.	.	.
	P	0.671	0.209	0.016	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.	.
Serine	r	-0.001	0.083	-0.104	0.651	0.656	0.770	0.710	0.687	0.751	0.707	0.654	0.715	0.751	0.744	0.715	0.772	0.642	.	.	.	.
	P	0.992	0.417	0.308	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.	.
Valine	r	-0.016	0.117	-0.187	0.854	0.827	0.983	0.906	0.889	0.941	0.944	0.853	0.920	0.995	0.997	0.953	0.976	0.893	0.753	.	.	.
	P	0.879	0.250	0.066	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.	.
Tryptophan	r	-0.051	0.060	-0.164	0.863	0.853	0.931	0.880	0.808	0.859	0.884	0.814	0.908	0.936	0.927	0.889	0.899	0.823	0.746	0.942	.	.
	P	0.620	0.559	0.107	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.	.
Tyrosine	r	-0.037	0.097	-0.172	0.855	0.756	0.952	0.854	0.836	0.906	0.909	0.789	0.893	0.972	0.982	0.941	0.952	0.899	0.738	0.982	0.912	.
	P	0.715	0.340	0.091	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	.

Values are log-transformed. Amino acid results shown for mg per kg body weight per day. Asn/Asp, asparagine/aspartic acid. BAP, bone-specific alkaline phosphatase. Gln/Glu, glutamine/glutamic acid. Phe, phenylalanine. PTH, parathyroid hormone. Trap5b, tartrate-resistant acid phosphatase 5b.