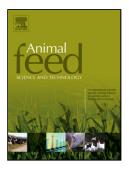
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Title: Effect of protein restriction followed by realimentation on growth, nutrient digestibility, ruminal parameters, and transporter gene expression in lambs



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## ACCEPTED MANUSCRIPT

Effect of protein restriction followed by realimentation on growth, nutrient digestibility, ruminal parameters, and transporter gene expression in lambs

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*Abbreviations:* VFA, volatile fatty acid; NPL, normal protein level; LPL, low protein level; MR, milk replacer; ME, metabolizable energy; ADG, average daily gain; DM, dry matter; OM, organic matter; CP, crude protein; GE, gross energy; EE, ether extract; NDF, neutral detergent fiber; ADF, acid detergent fiber; GADPH, glyceraldehyde 3-phosphate dehydrogenase; AE2, anion exchanger 2; DRA, downregulated in adenoma; MCT1, monocarboxylic acid transporter 1; MCT4, monocarboxylic acid transporter 4; Na<sup>+</sup>/K<sup>+</sup> ATPase, Na<sup>+</sup>/K<sup>+</sup> ATPase pump subunit α1; NHE1, Na<sup>+</sup>/H<sup>+</sup> exchanger 1; NHE2, Na<sup>+</sup>/H<sup>+</sup> exchanger 2; NHE3, Na<sup>+</sup>/H<sup>+</sup> exchanger 3; PAT1, putative anion transporter 1; vH<sup>+</sup> ATPase, vacuolar H<sup>+</sup> ATPase subunit B; SEM, standard error of the mean.

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