



CUMBERLAND VALLEY ANALYTICAL SERVICES

"Laboratory services for agriculture ... from the field to the feed bunk"

Farm: HUBKA FARMS LTD
Desc: 201K131 1ST CUT MIXED HAY
Submitter: HUBKA, CALE
Account: HUBKA FARMS LTD

Copies to: WHITTLE, CHRIS

Lab ID: 29849 018
Sampled: 01/07/2021
Arrived: 01/11/2021
Completed: 01/12/2021
Reported: 01/12/2021

201K131 1ST CUT MIXED HAY

SAMPLE INFORMATION

Lab ID: 29849 018 Version: 1.0
Crop Year: 2021 Series:
Feed Type: MIXED FORAGE Cutting#: 1
Package: BASIC NIR

NIR ANALYSIS RESULTS

Moisture 10.5
Dry Matter 89.5

PROTEINS

	% SP	% CP	% DM
Crude Protein			7.7
Adjusted Protein		96.7	7.5
Soluble Protein		40.2	3.1
Ammonia (CPE)	51.8	20.8	1.61
ADF Protein (ADICP)		13.3	1.03
NDF Protein (NDICP)		20.9	1.62
NDR Protein (NDRCP)			
Rumen Degr. Protein		70.1	5.4
Amino Acid Protein, Total			

FIBER

	% NDF	% DM
ADF	64.4	38.9
aNDF		60.4
aNDFom		57.8
NDR (NDF w/o sulfite)		
Crude Fiber		
Lignin	10.9	6.56
NDF Digestibility (12 hr)		
NDF Digestibility (24 hr)		
NDF Digestibility (30 hr)		
NDF Digestibility (72 hr)		
NDF Digestibility (120 hr)		
NDF Digestibility (240 hr)		
uNDF (12 hr)		
uNDF (30 hr)		
uNDF (120 hr)		
uNDF (240 hr)		

CARBOHYDRATES

	% Starch	% NFC	% DM
Ethanol Soluble CHO (ESC-Sugar)		29.7	7.6
Water Soluble CHO (WSC-Sugar)			12.8
Starch		8.1	2.1
Soluble Starch			
Soluble Fiber			
Starch Dig. (7 hr, 4 mm)			
Crude Fat			2.21
Fatty Acids, Total			
C16:0			
C18:0			
C18:1			
C18:2			
C18:3			
Unsaturated Fatty Acids (RUFAL)			
Fatty Acids (%Fat)			

MINERALS

Ash (%DM)	5.58
Calcium (%DM)	0.57
Phosphorus (%DM)	0.12
Magnesium (%DM)	0.17
Potassium (%DM)	1.27
Sulfur (%DM)	
Sodium (%DM)	
Chloride (%DM)	
Iron (PPM)	
Manganese (PPM)	
Zinc (PPM)	
Copper (PPM)	
Molybdenum (PPM)	

QUALITATIVE

pH
Total VFA (%DM)
Lactic Acid (%DM)
Lactic as % of Total VFA
Acetic Acid (%DM)
Butyric Acid (%DM)
1, 2 Propanediol (%DM)
Nitrate Ion (%DM)
Nitrate-Nitrogen, ppm

Soil Contamination Probability
Nitrate Probability
NIR Statistical Confidence

ENERGY & INDEX CALCULATIONS

TDN (%DM)	57.6
Net Energy Lactation (Mcal/lb)	0.59
Net Energy Maintenance (Mcal/lb)	0.57
Net Energy Gain (Mcal/lb)	0.31
ME (Mcal/lb)	0.96
AA Protein as % of Total Protein	
NDF Dig. Rate (Kd, %HR, Van Amburgh, Lignin*2.4)	
NDF Dig. Rate (Kd, %HR, uNDF)	4.4
Starch Dig. Rate (Kd, %HR, Mertens)	
Relative Feed Value (RFV)	90
Relative Forage Quality (RFQ)	
Milk per Ton (lbs/ton)	
Dig. Organic Matter Index (lbs/ton)	
Non Fiber Carbohydrates (%DM)	25.7
Non Structural Carbohydrates (%DM)	9.7
DCAD (meq/100gdm)	
Summative Index % (Mass Balance)	

Additional sample information, submitted documents and lab pictures linked to QR code



Values in bold were analyzed by wet chemistry methods.



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