



**Soil / Aggregate Test Report**

Client **SEFTON ENGINEERING CONSULTANTS**  
**40 STUTZ BEARCAT DRIVE**  
**SEDONA, AZ 86336**

Date of Report **10/22/21** Page **1** of **1**  
Job No. **2541JD420**  
Event No. **1** Lab No. **16646**  
Authorized By **CROCKETT SALINE** Date **10/13/21**  
Sample Location Designated By **C. Saline** Date **10/12/21**  
Sampled By **C. Saline** Date **10/12/21**  
Submitted By **E. Saline** Date **10/14/21**

Project **ALKEMISTA BREWERY AND COFFEE ROASTING**  
Project Address **26 GOODROW LN, SEDONA, AZ**  
Material Description **Red sandy silt**  
Material Use **Soils classification**  
Material Source **Native**  
Sample Location **34 Deg. 51 Min. 51.46 Sec North, 111 Deg. 47 Min. 52.17 Sec. West; 8 to 18 inches below existing surface**  
Special Instructions

Sieve analysis <b>ASTM C136</b> Finer Than No. 200 <b>ASTM C117, Procedure B</b>			Laboratory compaction characteristics		Method	
Sieve	Accumulative % passing	Specification				
6 in.			Dry unit weight, lbf/ft <sup>3</sup>	Sample Preparation		
4 in.				Rammer Used		
3 in.				Proctor curve Id. No.		
2 in.				Maximum dry unit weight, lbf/ft <sup>3</sup>		
1-1/2 in.				Optimum water content, %		
1 in.				Oversize Aggregate		
3/4 in.				Bulk specific gravity		
1/2 in.				Absorption, %		
3/8 in.				Oversize in laboratory sample, %		
1/4 in.				Water content, %		
No. 4						
No. 8						
No. 10						
No. 16						
No. 30	100					
No. 40	99					
No. 50	99					
No. 100	90					
No. 200	66					
			Result	Specs.	Result	Specs.
Liquid Limit, Plastic Limit & Plasticity Index						
Preparation method <b>Oven-dried</b>					Los Angeles (LA) Abrasion	
Processing method <b>ASTM D4318, Dry Preparation</b>					Grading	
Liquid Limit <b>ASTM D4318, Method B</b>			LL	NV	rev., % loss	
Plastic Limit <b>ASTM D4318</b>			PL	NP	rev., % loss	
Plasticity Index <b>ASTM D4318</b>			PI	NP	Fractured Faces By Weight	
Water Content % dry weight					One or more, %	
Swell Test					Two or more, %	
Surcharge psf					Total Salts (Solubility)	
Expansion, %					%	
Compacted to approximately of ASTM Method					Sulfates	
Initial water content %					%	
Dry unit weight lbf/ft <sup>3</sup>					Chlorides	
Organic Matter %					pH Determination	
Unified Soil Classification <b>ASTM D2487</b>					pH	
Group Symbol: <b>ML</b> Name: <b>Sandy silt</b>					Minimum Resistivity	
					ohm-cm	
					Expansion Index of Soil	
					EI	
					Initial dry unit weight, lbf/ft <sup>3</sup>	
					Initial degree of saturation	
					Initial water content, %	
					Final water content, %	

Comments:



The services referred to herein were performed in accordance with the standard of care practiced locally for the referenced method(s) and relate only to the condition(s) observed or sample(s) tested at the time and place stated herein. Western Technologies Inc. (WT) makes no other warranty or representation, express or implied, and has not confirmed information including source of materials submitted by others. This report shall not be reproduced, except in full, without the prior written approval of WT.