

CERTIFICATE OF ANALYSIS

Product Name: Leaf Hops, Packed

Lot Number: PR1-AKUWIL2058

Variety: Willamette

Crop Year: 2017

<u>Characteristic</u> <u>Typical Analysis</u> <u>Actual Analysis</u>

Alpha Acids: 2.5 - 17.5% (w/w) 4.7%

LCV by EBC Analytica V 7.5

Oil by Distillation: Varies by Variety 0.9%

ASBC Hops - 13 (%v/w)

Oil Profile by GC, EBC Analytica V 7.12: B-Pinene: 0.5 % Farnesene: 6.8%

Myrcene: 33.0 % Humulene: 29.4% Linalool: 0.5 % Geraniol: 0.1%

Caryophyllene: 11.6 %