

# AK 47 PASS



SAMPLE ID  
210561

SAMPLE NAME  
AK 47

MATRIX  
Concentrate

BATCH ID  
AMMO-VP-01

TRACK AND TRACE TEST PACKAGE  
1A406030000A812000000832

TRACK AND TRACE SOURCE PACKAGE(S)  
1A40603000042D4000001534

COLLECTED, RECEIVED  
08/19/2020 15:01, 08/20/2020 09:05

BATCH SIZE, SAMPLE SIZE  
1147 units, 36 units

PRODUCTION DATE  
05/28/2020

DISTRIBUTOR INFO  
Lightwork Distributors, LLC (Ammo)  
4651 West End Rd.  
Arcata, CA 95521  
License: C11-0000051-LIC

MANUFACTURER INFO  
ArcataX  
4651 West End Rd  
Arcata, CA 95521  
License: CDPH-10002992

**TOTAL  
CANNABINOIDS**

**70.52 %**

**TOTAL  
THC**

**63.77 %**

**TOTAL  
CBD**

**ND**

**Chemical Residue**

Permethrins: 0.3350 ug/g

**PASS**

**Chemical Residue GC**

No Analytes Detected

**PASS**

**Residual Solvent**

Acetone: <LLOQ, Isopropyl Alcohol: <LLOQ

**PASS**

**Microbial qPCR**

No Analytes Detected

**PASS**

**Heavy Metals**

Lead: 0.0736 ug/g, Mercury: <LLOQ

**PASS**

**Mycotoxins**

No Analytes Detected

**PASS**

**Filth and Foreign Material**

No Analytes Detected

**PASS**





### CANNABINOID ANALYSIS

**Total THC,CBD value(s) have been decarboxylated.**

TOTAL THC: 637.7 mg/g (63.77 %), 318.85 mg per package  
 TOTAL CBD: ND  
 TOTAL CANNABINOIDS: 705.2 mg/g (70.52 %)

UNIT OF MEASUREMENT: Milligrams per Gram(mg/g)

ANALYTE	RESULT	LOD	LLOQ	ANALYTE	RESULT	LOD	LLOQ
THCa	116.1 mg/g (11.61 %)	0.2000	0.4000	CBDv	ND	0.2000	0.4000
D9THC	535.9 mg/g (53.59 %)	0.2000	0.4000	CBGa	17.92 mg/g (1.792 %)	0.2000	0.4000
D8THC	5.152 mg/g (0.5152 %)	0.2000	0.4000	CBG	11.38 mg/g (1.138 %)	0.2000	0.4000
THCv	2.704 mg/g (0.2704 %)	0.2000	0.4000	CBN	4.417 mg/g (0.4418 %)	0.2000	0.4000
CBDa	ND	0.2000	0.4000	CBC	11.65 mg/g (1.165 %)	0.2000	0.4000
CBD	ND	0.2000	0.4000				

#### ADDITIONAL INFORMATION

Method: SOP-TECH-001  
 Instrument: UPLC-DAD

Sample Prepped 08/21/2020 10:15  
 Sample Analyzed 08/21/2020 10:16

Sample Approved 08/24/2020 10:18



### CHEMICAL RESIDUE ANALYSIS PASS

UNIT OF MEASUREMENT: Micrograms per Gram(ug/g)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL
Abamectin	ND	0.0200	0.0400	0.1000 Pass	Acephate	ND	0.0200	0.0400	0.1000 Pass
Acequinocyl	ND	0.0200	0.0400	0.1000 Pass	Acetamiprid	ND	0.0200	0.0400	0.1000 Pass
Aldicarb	ND	0.0200	0.0400	0.0 Pass	Azoxystrobin	ND	0.0200	0.0400	0.1000 Pass
Bifenazate	ND	0.0200	0.0400	0.1000 Pass	Bifenthrin	ND	0.0200	0.0400	3.000 Pass
Boscalid	ND	0.0200	0.0400	0.1000 Pass	Carbaryl	ND	0.0200	0.0400	0.5000 Pass
Carbofuran	ND	0.0200	0.0400	0.0 Pass	Chlorantraniliprole	ND	0.0200	0.0400	10.00 Pass
Clofentezine	ND	0.0200	0.0400	0.1000 Pass	Coumaphos	ND	0.0200	0.0400	0.0 Pass
Cyfluthrin	ND	0.4000	1.000	2.000 Pass	Cypermethrin	ND	0.4000	1.000	1.000 Pass
Daminozide	ND	0.0200	0.0400	0.0 Pass	Diazinon	ND	0.0200	0.0400	0.1000 Pass
Dichlorvos	ND	0.0200	0.0400	0.0 Pass	Dimethoate	ND	0.0200	0.0400	0.0 Pass
Dimethomorph	ND	0.0200	0.0400	2.000 Pass	Ethoprophos	ND	0.0200	0.0400	0.0 Pass
Etofenprox	ND	0.0200	0.0400	0.0 Pass	Etoxazole	ND	0.0200	0.0400	0.1000 Pass
Fenhexamid	ND	0.0200	0.0400	0.1000 Pass	Fenoxycarb	ND	0.0200	0.0400	0.0 Pass
Fenpyroximate	ND	0.0200	0.0400	0.1000 Pass	Fipronil	ND	0.0400	0.1000	0.0 Pass
Flonicamid	ND	0.0200	0.0400	0.1000 Pass	Fludioxonil	ND	0.0200	0.0400	0.1000 Pass
Hexythiazox	ND	0.0200	0.0400	0.1000 Pass	Imazalil	ND	0.0200	0.0400	0.0 Pass
Imidacloprid	ND	0.0200	0.0400	5.000 Pass	Kresoxim methyl	ND	0.0200	0.0400	0.1000 Pass
Malathion	ND	0.0200	0.0400	0.5000 Pass	Metalaxyl	ND	0.0200	0.0400	2.000 Pass
Methiocarb	ND	0.0200	0.0400	0.0 Pass	Methomyl	ND	0.0200	0.0400	1.000 Pass
Mevinphos	ND	0.0200	0.0400	0.0 Pass	Myclobutanil	ND	0.0200	0.0400	0.1000 Pass
Naled	ND	0.0200	0.0400	0.1000 Pass	Oxamyl	ND	0.0200	0.0400	0.5000 Pass
Paclobutrazol	ND	0.0200	0.0400	0.0 Pass	Permethrins	0.3350 ug/g	0.0400	0.1000	0.5000 Pass
Phosmet	ND	0.0200	0.0400	0.1000 Pass	Piperonyl butoxide	ND	0.0200	0.0400	3.000 Pass



Prallethrin	ND	0.0200	0.0400	0.1000	Pass	Propiconazole	ND	0.0200	0.0400	0.1000	Pass
Propoxur	ND	0.0200	0.0400	0.0	Pass	Pyrethrins	ND	0.0200	0.0400	0.5000	Pass
Pyridaben	ND	0.0200	0.0400	0.1000	Pass	Spinetoram	ND	0.0200	0.0400	0.1000	Pass
Spinosad	ND	0.0300	0.0700	0.1000	Pass	Spiromesifen	ND	0.0200	0.0400	0.1000	Pass
Spirotetramat	ND	0.0200	0.0400	0.1000	Pass	Spiroxamine	ND	0.0200	0.0400	0.0	Pass
Tebuconazole	ND	0.0200	0.0400	0.1000	Pass	Thiacloprid	ND	0.0200	0.0400	0.0	Pass
Thiamethoxam	ND	0.0200	0.0400	5.000	Pass	Trifloxystrobin	ND	0.0200	0.0400	0.1000	Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-002      Sample Prepped 08/24/2020 12:26      Sample Approved 08/24/2020 20:41  
 Instrument: LC-MS/MS      Sample Analyzed 08/24/2020 12:31

## CHEMICAL RESIDUE GC ANALYSIS PASS

UNIT OF MEASUREMENT: Micrograms per Gram(ug/g)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL
Captan	ND	0.1000	0.2000	0.7000 Pass	Chlordane	ND	0.0109	0.0136	0.0 Pass
Methyl parathion	ND	0.0400	0.1000	0.0 Pass	PCNB	ND	0.0200	0.0400	0.1000 Pass
Chlorfenapyr	ND	0.0800	0.1000	0.0 Pass	Chlorpyrifos	ND	0.0800	0.1000	0.0 Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-010      Sample Prepped 08/24/2020 12:25      Sample Approved 08/24/2020 20:23  
 Instrument: GC-MS/MS      Sample Analyzed 08/24/2020 12:31

## RESIDUAL SOLVENT ANALYSIS PASS

UNIT OF MEASUREMENT: Micrograms per Gram(ug/g)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL
Acetone	<LLOQ	5.000	250.0	5000 Pass	Acetonitrile	ND	5.000	50.00	410.0 Pass
Benzene	ND	0.5000	1.000	1.000 Pass	Butane	ND	76.80	96.00	5000 Pass
Chloroform	ND	0.5000	1.000	1.000 Pass	Ethanol	ND	10.00	50.00	5000 Pass
Ethyl Acetate	ND	5.000	50.00	5000 Pass	Ethyl Ether	ND	25.00	50.00	5000 Pass
Ethylene oxide	ND	0.5000	1.000	1.000 Pass	Heptane	ND	1.000	5.000	5000 Pass
Hexane	ND	0.5000	5.000	290.0 Pass	Isopropyl Alcohol	<LLOQ	5.000	50.00	5000 Pass
Methanol	ND	10.00	50.00	3000 Pass	Methylene chloride	ND	0.5000	1.000	1.000 Pass
Pentane	ND	1.000	50.00	5000 Pass	Propane	ND	16.00	20.00	5000 Pass
Toluene	ND	0.5000	1.000	890.0 Pass	Xylenes	ND	6.000	100.0	2170 Pass
Trichloroethylene	ND	0.2500	1.000	1.000 Pass	1,2-Dichloroethane	ND	0.5000	1.000	1.000 Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-021      Sample Prepped 08/22/2020 14:34      Sample Approved 08/24/2020 15:13  
 Instrument: HS-GC-MS/FID      Sample Analyzed 08/22/2020 14:37

**MICROBIAL qPCR ANALYSIS** PASS

UNIT OF MEASUREMENT: Cycle Threshold (Ct)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL		ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	
A.fumigatus	ND	33.00	0.0	0.0	Pass	A. flavus	ND	33.00	0.0	0.0	Pass
A. niger	ND	33.00	0.0	0.0	Pass	A. terreus	ND	33.00	0.0	0.0	Pass
STEC	ND	33.00	0.0	0.0	Pass	Salmonella spp	ND	33.00	0.0	0.0	Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-016, SOP-TECH-022      Sample Prepped 08/21/2020 05:53      Sample Approved 08/21/2020 13:26  
 Instrument: qPCR      Sample Analyzed 08/21/2020 05:55

**HEAVY METALS ANALYSIS** PASS

UNIT OF MEASUREMENT: Micrograms per Gram(ug/g)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL		ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	
Arsenic	ND	0.0200	0.0500	0.2000	Pass	Cadmium	ND	0.0050	0.0500	0.2000	Pass
Lead	0.0736 ug/g	0.0100	0.0500	0.5000	Pass	Mercury	<LLOQ	0.0030	0.0500	0.1000	Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-013      Sample Prepped 08/24/2020 06:19      Sample Approved 08/24/2020 15:35  
 Instrument: ICP-MS      Sample Analyzed 08/24/2020 06:24

**MYCOTOXINS ANALYSIS** PASS

UNIT OF MEASUREMENT: Micrograms per Kilogram(ug/kg)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL		ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	
Aflatoxin B1	ND	1.000	2.000	N/A		Aflatoxin B2	ND	2.000	5.000	N/A	
Aflatoxin G1	ND	2.000	5.000	N/A		Aflatoxin G2	ND	2.000	5.000	N/A	
Total Aflatoxins	ND	10.00	14.00	20.00	Pass	Ochratoxin A	ND	1.000	2.000	20.00	Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-020      Sample Prepped 08/21/2020 14:02      Sample Approved 08/24/2020 11:33  
 Instrument: LC-MS/MS      Sample Analyzed 08/21/2020 14:12

**FILTH & FOREIGN MATERIAL ANALYSIS** PASS

UNIT OF MEASUREMENT: Filth and Foreign Matter (%)

ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL		ANALYTE	RESULT	LOD	LLOQ	ACTION LEVEL	
IF RH ME	ND	0.0	0.0	3.000	Pass	IFM	ND	0.0	0.0	25.00	Pass
Mold	ND	0.0	0.0	25.00	Pass	SSCD	ND	0.0	0.0	25.00	Pass

**ADDITIONAL INFORMATION**

Method: SOP-TECH-009      Sample Prepped 08/20/2020 15:01      Sample Approved 08/20/2020 15:08  
 Instrument: Visual Inspection      Sample Analyzed 08/20/2020 15:01

This report applies to the sample investigated and is not necessarily indicative of the quality or condition of apparently identical or similar products. This report provides technical results for a specific sample and the report shall not be altered, modified, supplemented, or abstracted in any manner. Any violation of these conditions renders the report and its results void.

All LQC samples required by state regulations were performed and met the acceptance criteria.

**THIS COA WAS REVIEWED AND APPROVED ON 08/24/2020, BY THE FOLLOWING:**



Cody Sheppard, PhD  
Co-Scientific Director



Kathryn Riker  
Quality Control Manager