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TEST REPORT

REPORT NO.: 19-08-14712

*Expert Health & Wellness
4 Slaney Court
Dublin Industrial Estate
Glasnevin
Dublin 11.*

<i>Date of Sample:</i>	<i>15-August-2019</i>	<i>Test Report Number:</i>	<i>19-08-14712</i>
<i>Date of Receipt:</i>	<i>16-August-2019</i>	<i>Sample Type:</i>	<i>Hemp CBD Oil Sample.</i>
<i>Date of Report:</i>	<i>22-August-2019</i>	<i>Sample Reference:</i>	<i>Ref. Pet Care 300mg Batch # 00002</i>
<i>Laboratory Ref. Number:</i>	<i>19-16912</i>	<i>Sample Presentation:</i>	<i>10ml. Dispensing Bottle</i>
		<i>Weight of sample :</i>	

Abbreviations :

- % Vol :* *percentage volume.* *% wt:* *percentage weight.*
- mg/L :* *milligrams per litre (ppm).* *ppm :* *parts per million or mg per litre.*
- mg/g:* *milligrams per gram.*

Terpenes Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
β-Caryophellene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	2.50
Myrcene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	2.45
β-Sitosterol	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Terpinolene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
A-Pinene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	2.25
β-Pinene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	1.75
Bergamotene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	1.80
Limonene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Merolidol	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Linalool	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	1.65
Humulene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	1.80
Bisabolol	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	1.50
Valencene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Trans- β-Ocimene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Borneol	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected
Delta-3-Carene	HS-GC-FID	Shimadzu HS-GC-FID	mg/g.	Not Detected

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Cannabinoids Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
Cannabidiol CBD.	UHPLC-MS-MS	JHG-249	mg/ml.	27.50
Cannabigerol CBG.	UHPLC-MS-MS	JHG-249	mg/ml.	1.70
Cannabichromene CBC.	UHPLC-MS-MS	JHG-249	mg/ml.	0.300
Delta-9-Tetrahydrocannabinol THC.	UHPLC-MS-MS	JHG-249	mg/ml.	Not Detected
Delta-9-Tetrahydrocannabinolic acid THC-A.	UHPLC-MS-MS	JHG-249	mg/ml.	Not Detected
Cannabidiol acid CBD-A	UHPLC-MS-MS	JHG-249	mg/ml.	0.300
Cannabigerolic acid CBG-A	UHPLC-MS-MS	JHG-249	mg/ml.	0.200
Tetrahydrocannabivarin THCv	UHPLC-MS-MS	JHG-249	mg/ml.	Not Detected
Tetrahydrocannabinol -A.	UHPLC-MS-MS	JHG-249	mg/ml.	Not Detected

Pesticide Residues Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
Organochlorine	UHPLC-MS	APHA 6630	mg/ml.	Not Detected
Organophosphorus	UHPLC-MS	APHA 6630	mg/ml.	Not Detected
Organonitrogen	UHPLC-MS	APHA 6630	mg/ml.	Not Detected
Carbamate Pesticides	UHPLC-MS	APHA 6630	mg/ml.	Not Detected
Pyrethroid Residues	UHPLC-MS	APHA 6630	mg/ml.	Not Detected
Organotin	UHPLC-MS	APHA 6630	mg/ml.	Not Detected

Heavy Metals Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
Mercury as Hg.	Cold Vapour AAS	EC 1881	mg/ml.	Not Detected
Chromium as Cr.	ICP-OES	EC 1881	mg/ml.	Not Detected
Arsenic as As.	ICP-OES	EC 1881	mg/ml.	Not Detected
Cadmium as Cd.	ICP-OES	EC 1881	mg/ml.	Not Detected
Nickel as Ni.	ICP-OES	EC 1881	mg/ml.	Not Detected
Lead as Pb.	ICP-OES	EC 1881	mg/ml.	Not Detected

Aflatoxins/Ochratoxins Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
Ochratoxin	HPLC-PDA	EC 401	mg/ml.	Not Detected
Aflatoxins Scan	HPLC-PDA	EC 401	mg/ml.	Not Detected
B1	HPLC-PDA	EC 401	mg/ml.	Not Detected
B2	HPLC-PDA	EC 401	mg/ml.	Not Detected
G1	HPLC-PDA	EC 401	mg/ml.	Not Detected
G2	HPLC-PDA	EC 401	mg/ml.	Not Detected

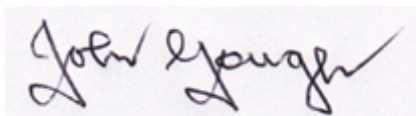
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Microbiological Analysis

Parameter	Method of Analysis	Method Reference	Units	Reported Levels
Staph. aureus	Pour Plate Count	APHA 9222	CFU/ml.	2
Salmonella spp.	Pour Plate Count	APHA 9222	CFU/25ml.	< 100
Listeria spp.	Pour Plate Count	APHA 9222	CFU/25ml.	< 100
Bacillus cereus	Pour Plate Count	APHA 9222	CFU/ml.	< 100
Clostridia spp.	Pour Plate Count	APHA 9222	CFU/ml.	< 100
Enterobacteriaceae	Pour Plate Count	APHA 9222	CFU/ml.	< 10
Esch. Coli	Pour Plate Count	APHA 9222	CFU/ml.	< 10
Total Coliforms	Pour Plate Count	APHA 9222	CFU/ml.	< 10
Yeasts/Molds	Pour Plate Count	APHA 9222	CFU/ml.	4

J.W. GOUGH



Technical Signatory.

Dated : 22nd. August 2019