HELLENIC ACCREDITATION SYSTEM

Annex F1/23 to the Certificate No. **518**-5

SCOPE of ACCREDITATION

of the

Testing Laboratory

BIORESEARCH LABORATORIES S.A.

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
Chemical tests		
1. Water for human consumption, ground water and swimming pool water	1. Determination of chlorides	Modified argentometric method based on ELOT 666:1983 standard
	2. Determination of nitrates	HACH LANGE LCK 339
	3. Determination of Phosphates	HACH LANGE LCK 349
	4. Determination of ammonium	HACH LANGE LCK 304
	5. Determination of pH	In House Method based on APHA* 4500 - H+
	6. Determination of conductivity	In House Method based on APHA* 2510 – B
	7. Determination of sulfates	HACH 8051 PP SULFAVER 4
	8. Determination of nitrites	HACH LANGE LCK 341
	9. Determination of total hardness	ELOT 170
	10. Determination of alkalinity	APHA* 2320-B
	11. Determination of calcium	APHA* 3500-Ca-B
	12. Determination of magnesium	APHA* 3500-Mg-B
	13. Determination of free and total chloride	HACH 8021 PP

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
1. Water for human consumption, surface water ground water and swimming pool water (continued)	14. Determination of Turbidity	In House Method based on HACH METHOD 8195
	15. Determination of bound chloride	Calculated
	16. Determination of Ammonium Nitrogen	HACH LANGE LCK 304
	17. Determination of Nitrogen Nitrate, NO3-N	HACH LANGE LCK 339
	18. Determination of carbonate (temporary) hardness	In House Method based on APHA* 2320 B and APHA* 2340 A
	19. Determination of non-carbonate (permanent) hardness	In House Method based on APHA* 2320 B and APHA* 2340 A
	20. Determination of Color	APHA* 2120 – C
	21. Determination of elements with ICP-MS Aluminium (Al), Antimony (Sb), Arsenic (As), Barium (Ba), Beryllium (Be), Boron (B), Cadmium (Cd), Calcium (Ca), Chromium (Cr), Cobalt (Co), Copper (Cu), Iron (Fe), Lead (Pb), Lithium (Li), Magnesium (Mg), Manganese (Mn), Mercury (Hg), Molybdenum (Mo), Nickel (Ni), Phosphorus (P), Potassium (K), Selenium (Se), Silver (Ag), Sodium (Na), Strontium (Sr), Thallium (Tl), Tin (Sn), Titanium (Ti), Uranium (U), Vanadium (V), Zinc (Zn)	ISO 17294-1, ISO 17294-2
2. Water for swimming pool water	Determination of Cyanuric Acid	HACH LANGE Method 8139
3. Wastewater	1. Determination of COD	HACH LANGE LCK 314, LCK 514
	2. Determination of BOD	AQUALYTIC BOD SENSOR MANUAL based on APHA 5210D
	3. Determination of Total Nitrogen	HACH LANGE LCK 138
	4. Determination of Total Suspended Solids (TSS)	APHA* 2540 - D
	5. Determination of chlorides	Modified argentometric method based on ELOT 666:1983 standard
	6. Determination of nitrates	HACH LANGE LCK 339
	7. Determination of Total Phosphorus	HACH LANGE LCK 349
	8. Determination of ammonium	HACH LANGE LCK 304
	9. Determination of pH	In House Method based on APHA* 4500 – H+

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
3. Wastewater (continued)	10. Determination of conductivity	In House Method based on APHA* 2510 – B
	11. Determination of Free Chloride and Total Chloride	HACH 8021 PP
	12. Determination of Turbidity	In House Method based on HACH METHOD 8195
	13. Determination of Total Alkalinity mg/L $CaCO_3$	APHA* 2320 - B
	14. Determination of Nitrites mg/L NO_2^-	HACH LANGE LCK 341
	15. Determination of bound chloride	Calculated
	16. Determination of Ammonium Nitrogen	HACH LANGE LCK 304
	17. Determination of Nitrogen Nitrate, NO3-N	HACH LANGE LCK 339
	18. Determination of Phosphates	HACH LANGE LCK 349
	19. Determination of Total Solids, TS (103 – 105 °C)	APHA* 2540 - B
	20. Determination of Total Dissolved Solids, TDS (180 °C)	APHA* 2540 C, - B
	21. Determination of elements with ICP-MS Aluminium (Al), Antimony (Sb), Arsenic (As), Barium (Ba), Beryllium (Be), Boron (B), Cadmium (Cd), Calcium (Ca), Chromium (Cr), Cobalt (Co), Copper (Cu), Iron (Fe), Lead (Pb), Lithium (Li), Magnesium (Mg), Manganese (Mn), Mercury (Hg), Molybdenum (Mo), Nickel (Ni), Phosphorus (P), Potassium (K), Selenium (Se), Silver (Ag), Sodium (Na), Strontium (Sr), Thallium (Tl), Tin (Sn), Titanium (Ti), Uranium (U), Vanadium (V), Zinc (Zn)	In House Method based on ISO 17294-1, ISO 17294-2 & EPA Method 3015
4. Meat and Meat products	1. Determination of moisture content	ISO 1442:2023
	2. Determination of total ash	ISO 936:1998
	3. Determination of nitrogen content	ISO 937:2023
	4. Determination of total fat content	ISO 1443:1973
5. Cheese	1. Determination of the total solids content	ISO 5534:2004
	2. Determination of ash	AOAC 935.42
	3. Determination of total fat	ISO 23318:2022
		ISO 23319:2022
	4. Determination of nitrogen content	ISO 8968-1:2014 (Kjeldahl)

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
6. Milk	1. Determination of fat	ISO 23318:2022
	2. Determination of nitrogen content	ISO 8968-1:2014 (Kjeldahl)
	3. Determination of pH	ISO 11289:1993
7. Raw milk	1. Determination of fat	Manufacturer method of automated analyzer, Mid Infrared Spectrometry (FTIR technique) (MILKOSCAN FT+)
	2. Determination of nitrogen content	
	3. Determination of freezing point	ISO 5764:2009 Thermistor cryoscope method (Reference method)
8. Flour, Cereals, and cereals products	1. Determination of Total Dietary Fiber	AOAC Method 985.29
	2. Determination of Ash	AOAC Method 923.03
	3. Determination of Moisture	ISO 712:2009
	4. Determination of Proteins	In House Method based on Kjeldahl AOAC Method 991.20 & ISO 1871:2009
	5. Determination of total fat content	AOAC Method 922.06
9. Animal feeding stuffs	1. Determination of moisture and other volatile matter content	ISO 6496:1999
	2. Determination of crude ash	ISO 5984:2022
	3. Determination of nitrogen content	ISO 5983-1:2005 (Kjeldahl)
	4. Determination of total fat content	ISO 6492:1999
	5. Determination of crude fibre content	ISO 6865:2000
10. Olive Oil, Olive Pomace oils	1. Determination of Acidity	COI/T20/DOC No34
	2. Determination of Peroxide value	COI/T20/DOC No35
	3. Absorption coefficient K (for λ=232 nm and 268 nm) and Absorption coefficient difference (ΔK)	COI/T20/DOC No19
	4. Determination of moisture content and volatile in animal and vegetable fats and oils	ISO 662:2016
11. Vegetable fats and oils	Determination of methyl esters of fatty acids by Gas Chromatography	COI/T.20/Doc. No 33 as in force
12. Honey	1. Determination of Moisture	HARMONISED METHODS OF THE INTERNATIONAL HONEY COMMISSION (2009)
	2. Determination of electrical conductivity	
12. Honey	3. Determination of Diastase Activity	HARMONISED METHODS

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
(continued)		OF THE INTERNATIONAL HONEY COMMISSION (2009) Method 6.1
	4. Determination of Hydroxymethylfurfural (HMF)	HARMONISED METHODS OF THE INTERNATIONAL HONEY COMMISSION (2009) Method 5.2
	5. Determination of thymus pollen grains in honey	In house Method, based on Methods of the International Honey Commission [Apidologie 35 (Suppl.1) (2004)], by Microscope Method Code
	6. Determination of Sugars: (fructose, glucose, sucrose)	HARMONISED METHODS OF THE INTERNATIONAL HONEY COMMISSION (2009) Method 7.2
	7. Determination of pH and of free acidity	HARMONISED METHODS OF THE INTERNATIONAL HONEY COMMISSION (2009), Method 4.0
13. Food	Determination of Sugars: (fructose, glucose, sucrose, lactose)	In house Method, based on AOAC 980.13, 982.14 και 977.20
14. Food (Milk & milk products – Meat and meat products)	Determination of Fatty Acids by Gas Chromatography	In house Method, based on: ISO 16958:2015 ISO 15885:2002 ISO 12966-4:2015
15. Soil	1. Determination of pH	ISO 10390:2021
	2. Determination of electrical conductivity	ISO 11265:1994
	3. Determination of mechanical composition	In house method (OE08-104) by Bouyoucos densimeter
	4. Determination of dry matter and water content on a mass basis	ISO 11465:1993
	5. Determination of calcium carbonate	In house method, (OE08-102) based on FAO 2020 (GLOSOLAN-SOP-04; Bernard method)
	6. Determination of oxidizable organic carbon	In house method (OE08-103) based on FAO 2019 (GLOSOLAN-SOP-02; Walkey-Black method)
	7. Determination of total nitrogen	ISO 11261:1995
	8. Determination of extractable elements by nitric acid and hydrochloric acid (phosphorus, potassium, magnesium, boron)	In house method (OE08-105), with ICP-MS, based on ISO/TS 16965:2013 and FAO 2023 (GLOSOLAN-SOP-19)
15. Soil	9. Determination of Phosphorus (P)	FAO 2021 (GLOSOLAN-

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
(continued)		SOP-10) Olsen Method
	10. Determination of Boron (B)	FAO 2024 (GLOSOLAN-SOP-24) Hot water extraction
	11. Determination of Organic mater	FAO 2019 (GLOSOLAN-SOP-02; μέθοδος Walkley-Black
	12. Determination of extractable elements by ammonium acetate Magnesium (Mg) & Potassium (K)	In house method with ICP-MS, based on ISO/TS 16965:2013 και FAO 2023 (GLOSOLAN-SOP-17)
16. Leaves / Plant tissues	1. Determination of total nitrogen	In house method (OE08-106), based on AOAC 978.04, AOAC 955.04D and ISO 1871:2009 (modified Kjeldahl method)
	2. Determination of elements (calcium, phosphorus, potassium, magnesium, boron)	In house method (OE08-107), with ICP-MS, based on ISO/TS 16965:2013 and EPA 3051A (after microwave and strong acid digestion)
17. Fruits and vegetables with high water content and high acid content (stone fruits, pome fruits, fruiting vegetables, leafy vegetables, citrus fruits and fresh herbs, root and tuber vegetables, stem vegetables & stalk vegetables, small fruits, grape, tropical fruits, legume vegetables, brassica vegetables, bulb vegetables, fresh herbs, miscellaneous fruits as referred to Regulations EU 396/2005, EU 178/2006 and Guidance Document *ESYD G-FYTOPROST/01/02/20-10-2016)*	1. Residue-determination of agricultural drugs: 2-Diethylaminoethyl Hexanoate, Acephate, Acetamiprid, Acetochlor, Alachlor, Aldicarb, Aldicarb Sulfone, Aldicarb Sulfoxide, Ametoctradin, Ametryn, Anilofos, Atrazine, Avermectin B1a, Azinphos Methyl, Azoxystrobin, Benalaxyl, Benazolin-Ethyl Ester, Bendiocarb, Benfsulfuron Methyl, Benzovindiflupir, Benzoxymate, Bifenox, Bifethrin, Bioresmethrin, Bitertanol, Boscalid, Bromuconazole, Bupirimate, Buprofezin, Cadusafos, Carbaryl, Carbendazim, Carbofuran, Carbofuran 3-OH, Carboxin, Carfentrazone-Ethyl, Chlorantraniliprole, Chlordimeform Free Base, Chlorfevinphos, Chlorfluazuron, Chloridazone, Chlorpropham, Chlorpyrifos Ethyl, Chlorpyrifos Methyl, Chlortoluron, Chromafenozide, Clethodim Sulfone, Clethodim Sulfoxide, Clofentezin, Clomazone, Clothianidin, Coumaphos, Coumoxystrobin, Cyanazine, Cyantraniliprole, Cyazofamid, Cyazofamid-Dessulfonamide, Cyflufenamid, Cyflumetofen, Cymoxanil, Cyproconazole, Cyprodinil, Deltamethrin, Demeton S Methyl Sulfone, Demeton S Methyl Sulfoxide, Demeton-S Methyl, Diazinon, Dichlorvos, Diclofop Methyl, Dicrotophos, Diethofencarb, Diflubenzuron, Diflufenican, Dimepiperate, Dimethenamid, Dimethoate, Dimethomorph, Dimoxystrobin, Diniconazole, Disulfoton, Disulfoton-Sulfone, Disulfoton-Sulfoxide, Diuron, Epoxiconazole, Ethion, Ethiprol, Ethirimol, Ethofumesate, Ethoprophos, Etofenprox, Etoxazole, Etrimfos, Famoxadone, Fenamidone, Fenamiphos, Fenamiphos Sulfone Fenamiphos Sulfoxide, Fenazaquin, Fenbuconazole, Fenhexamide, Fenobucarb, Fenothiocarb, Fenoxanil, Fenoxycarb, Fenpropathrin, Fenpropidin, Fenpropimorph, Fenpyrazamine, Fenpyroximate, Fensulfothion, Fensulfothion Sulfone, Fensulfothion-Oxon, Fensulfothion-Oxon-Sulfone, Fenthion, Fenthion Sulfone, Fenthion Sulfoxide, Flonicamid, Fluazifop P Butyl, Flubendiamide, Fludioxonil, Flufenacet, Flufenoxuron, Flumetralin, Fluopyram, Fluoroglycofen Ethyl, Flurtamon, Flusilazole, Flutolanil, Flutriafol, Fluxapyroxad, Fonofos, Forchlorfenuron, Fosthiazate, Heptenophos, Hexaconazole, Hexazinone, Hexythiazox, Imazalil, Imibenconazole, Indoxacarb, Ipconazole, Iprobenphos, Iprodione, Iprovalicarb, Isazophos, Isophenphos Methyl, Isoprothiolane, Isoproturon, Isopyrazam, Isoxaflutole, Ivermectin, Kresoxim Methyl, Linuron, Lufenuron, Malaoxon, Malathion, Mefenacet, Mepronil, Metaflumizone,	In house multi-residue method, OE08-110 employing Liquid Chromatography-Mass Spectrometry LC-MS/MS, based on QuEChERS EN 15662:2018
17. Fruits and vegetables with high water content		

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
and high acid content (stone fruits, pome fruits, fruiting vegetables, leafy vegetables, citrus fruits and fresh herbs, root and tuber vegetables, stem vegetables & stalk vegetables, small fruits, grape, tropical fruits, legume vegetables, brassica vegetables, bulb vegetables, fresh herbs, miscellaneous fruits as referred to Regulations EU 396/2005, EU 178/2006 and Guidance Document ESYD G-FYTOPROST/01/02/20-10-2016) (continued)	Metalaxyl Total, Metamifop, Metamitron, Metazachlor, Metconazole, Methidathion, Methiocarb, Methiocarb Sulfone, Methiocarb Sulfoxide, Methomyl, Methoxyfenozide, Metolachlor, Metolcarb, Metrafenone, Metribuzin, Mevinphos (phosdrin), Molinate, Monocrotophos, Myclobutanil, Napropamid, Nitenpyram, Novaluron, Omethoate, Oxadiazone, Oxadixyl, Oxamyl, Oxamyl-Oxine, Oxaziclomefone, Paclobutrazole, Parathion Ethyl, Penconazole, Pencycuron, Pendimethalin, Penflufen, Penoxsulam, Penthiopyrad, Phenamacril, Phenmedipham, Phenthoate, Phorate Sulfone, Phorate Sulfoxide, Phosalone, Phosfolan, Phosmet, Phosmetoxon, Phosphamidon, Phospholan-Methyl, Phoxim, Picolinafen, Picoxystrobin, Piperonyl Butoxide, Pirimicarb, Pirimicarb Desmethyl, Pirimicarb-Desmethyl, Formamido, Pirimiphos Methyl, Pretilachlor, Prochloraz, Profenofos, Promecarb Prometryn, Propachlor, Propanil, Propaquizafop, Propargite, Propiconazole, Propoxur, Propyzamide, Proquinazid, Prosulfocarb, Pyraclostrobin, Pyribenzoxim, Pyridaben, Pyridafenthion, Pyridalil, Pyrimethanil, Pyriproxyfen, Pyrisoxazole, Quinalphos, Quizalofop Ethyl, Rotenone, Saflufenacil, Sedaxane, Silthiofam, Simazine, Simetryn, Spinetoram, Spinosyn A&D, Spirodiclofen, Spiromesifen, Spirotetramat, Spirotetramat Enol Glucoside, Spirotetramat Keto Hydroxy, Spirotetramat Mono Hydroxy, Sulfotep, Sulfoxaflor, Tebuconazole, Tebufenozide, Tebuthiuron, Terbufos, Terbufos Sulfone, Terbufos Sulfoxide, Terbuthylazine, Tetraconazole, Thiabendazole, Thiacloprid, Thiamethoxam, Thidiazuron, Thifluzamide, Thifensulfuron methyl, Thiophanate methyl, Tolclofos methyl, Tolfenpyrad, Triadimefon, Triadimenol, Triazophos, Tribenuron metyhl, Trichlorphon, Tricyclazole, Trifloxystrobin, Triflumizole, Triflumizole amino, Triflumuron, Triflusulfuron methyl, Triticonazole, Tritosulfuron, Uniconazole, Vamidothion, Zoxamide	
18. Cereals and legumes (Guidance Document *ESYD G-FYTOPROST/01/02/20-10-2016)*	1. Residue-determination of agricultural drugs: 2-Diethylaminoethyl Hexanoate, Acephate, Acetamiprid, Acetochlor, Alachlor, Aldicarb, Aldicarb Sulfone, Aldicarb Sulfoxide, Ametoctradin, Ametryn, Amidosulfuron, Anilofos, Atrazine, Avermectin B1a, Azinphos Methyl, Azoxystrobin, Benalaxyl, Benazolin-Ethyl Ester, Bendiocarb, Benfsulfuron Methyl, Benzovindiflupir, Benzoxymate, Bifenox, Bifethrin, Bioresmethrin, Bitertanol, Boscalid, Bromuconazole, Bupirimate, Buprofezin, Cadusafos, Carbaryl, Carbendazim, Carbofuran, Carbofuran 3-Oh, Carboxin, Carfentrazone-Ethyl, Chlorantraniliprole, Chlordimeform Free Base, Chlorfevinphos, Chlorfluazuron, Chloridazone, Chlorimuron Ethyl, Chlorpropham, Chlorpyrifos Ethyl, Chlorpyrifos Methyl, Chlorsulfuron, Chlortoluron, Chromafenozide, Clethodim Sulfone, Clethodim Sulfoxide, Clofentezin, Clomazone, Clothianidin, Coumaphos, Coumoxystrobin, Cyanazine, Cyantraniliprole, Cyazofamid, Cyazofamid- Dessulfonamide, Cycloxydim, Cyflufenamid, Cyflumetofen, Cymoxanil, Cyproconazole, Cyprodinil, Deltamethrin, Demeton S Methyl Sulfone, Demeton S Methyl Sulfoxide, Demeton-S Methyl, Diazinon, Dichlorvos, Diclobutrazol, Diclofop Methyl, Dicrotophos, Diethofencarb, Difenoconazole, Diflubenzuron, Diflufenican, Dimepiperate, Dimethenamid, Dimethoate, Dimethomorph, Dimoxystrobin, Diniconazole, Disulfoton-Sulfone, Disulfoton-Sulfoxide, Diuron, Emamectin B1a & B1b benzoate-A, Epn, Epoxiconazole, Ethion, Ethiprol, Ethirimol, Ethofumesate, Ethoprophos, Ethoxysulfuron, Etofenprox, Etoxazole, Etrimfos, Famoxadone, Fenamidone, Fenamiphos, Fenamiphos Sulfone, Fenamiphos Sulfoxide, Fenarimol, Fenazaquin, Fenbuconazole, Fenhexamide, Fenobucarb, Fenothiocarb, Fenoxanil, Fenoxycarb, Fenpropathrin, Fenpropidin, Fenpropimorph, Fenpyrazamine, Fenpyroximate, Fensulfothion, Fensulfothion Sulfone, Fensulfothion-Oxon, Fensulfothion-Oxon-Sulfone, Fenthion, Fenthion Sulfone, Fenthion Sulfoxide, Flonicamid, Florasulam, Fluazifop P Butyl,	In house multi-residue method, OE08-110 employing Liquid Chromatography-Mass Spectrometry LC-MS/MS, based on QuEChERS EN 15662:2018
18. Cereals and legumes		

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
(Guidance Document *ESYD G-FYTOPROST/01/02/20-10-2016)* (continued)	Flubendiamide, Fludioxonil, Flufenacet, Flufenoxuron, Flumetralin, Flumetsulam, Fluopicolide, Fluopyram, Fluoroglycofen Ethyl, Flurtamon, Flusilazole, Fluthiacet Methyl, Flutolanil, Flutriafol, Fluxapyroxad, Fonofos, Forchlorfenuron, Fosthiazate, Halosulfuron Methyl, Heptenophos, Hexaconazole, Hexazinone, Hexythiazox, Imazalil, Imibenconazole, Imidacloprid, Indoxacarb, Ipconazole, Iprodione, Iprovalicarb, Isazophos, Isophenphos Methyl, Isoprothiolane, Isoproturon, Isopyrazam, Isoxaflutole, Isoxaflutole-Diketonirile, Kresoxim Methyl, Linuron, Lufenuron, Malaoxon, Malathion, Mandipropamid, Mefenacet, Mepronil, Mesosulfuron Methyl, Metaflumizone, Metalaxyl Total, Metamifop, Metamitron, Metazachlor, Metconazole, Methamidophos, Methidathion, Methiocarb, Methiocarb Sulfone, Methiocarb Sulfoxide, Methomyl, Methoxyfenozide, Metolachlor, Metolcarb, Metrafenone, Metribuzin, Metsulfuron Methyl, Mevinphos (phosdrin), Molinate, Monocrotophos, Myclobutanil, Napropamid, Nitenpyram, Novaluron, Omethoate, Oxadiazone, Oxadixyl, Oxamyl, Oxamyl-Oxine, Oxaziclomefone, Paclobutrazole, Parathion Ethyl, Penconazole, Pencycuron, Pendimethalin, Penflufen, Penoxsulam, Penthiopyrad, Phenamacril, Phenmedipham, Phenthoate, Phorate Sulfone, Phorate Sulfoxide, Phosalone, Phosfolan, Phosmet, Phosmetoxon, Phosphamidon, Phospholan-Methyl, Phoxim, Picolinafen, Picoxystrobin, Piperonyl Butoxide, Pirimicarb, Pirimicarb Desmethyl, Pirimicarb Desmethyl Formamido, Pirimiphos Methyl, Pretilachlor, Prochloraz, Profenofos, Promecarb, Prometryn, Propachlor, Propanil, Propaquizafop, Propargite, Propiconazole, Propoxur, Propyzamide, Proquinazid, Prosulfocarb, Pyraclostrobin, Pyraflufen Ethyl, Pyrethrin I, Pyribenzoxim, Pyridaben, Pyridafenthion, Pyridalil, Pyriftalid, Pyrimethanil, Pyriproxyfen, Pyrisoxazole, Quinalphos, Quizalofop Ethyl, Rotenone, Saflufenacil, Sedaxane, Silthiofam, Simazine, Simetryn, Spinetoram, Spinosyn A&D, Spirodiclofen, Spiromesifen, Spirotetramat, Spirotetramat Enol Glucoside, Spirotetramat Keto Hydroxy, Spirotetramat Mono Hydroxy, Sulfotep, Sulfoxaflor, Tebuconazole, Tebufenozide, Tebuthiuron, Teflubenzuron, Terbufos, Terbufos Sulfone, Terbufos Sulfoxide, Terbuthylazine, Tetraconazole, Thiabendazole, Thiacloprid, Thiamethoxam, Thidiazuron, Thifluzamide, Thifensulfuron Methyl, Thiophanate Methyl, Tolclofos Methyl, Tolfenpyrad, Triadimefon, Triadimenol, Triasulfuron, Triazophos, Tribenuron Metyhl, Trichlorphon, Tricyclazole, Trifloxystrobin, Triflumizole, Triflumizole Amino, Triflumuron, Triflusulfuron Methyl, Triticonazole, Tritosulfuron, Uniconazole, Vamidothion, Zoxamide	
19. Products with high sugar content: honey, jams etc. • Honey • Raisins • Jam • Figs, molasses etc. *(ESYD G-FYTOPROST/01/02/20-10-2016-* *PRODUCT CATEGORY 4.2-3 & SANTE/ 11312/2021)* 19. Products with high	1. Residue-determination of agricultural drugs: Acephate, 2-Diethylaminoethyl Hexanoate, Acetamiprid, Acetochlor, Albendazole, Aldicarb, Aldicarb Sulfone, Aldicarb Sulfoxide, Ametoctradin, Ametryn, Amidosulfuron, Amisulbrom, Amitraz, Amitraz total, Anilofos, Atrazine, Avermectin B1A, Azinphos Methyl, Azoxystrobin, Benalaxyl, Benazolin-Ethyl Ester, Bendiocarb, Benfsulfuron Methyl, Benzovindiflupir, Benzoxymate, Bifenox, Bifethrin, Bioresmethrin, Bitertanol, Boscalid, Bromuconazole, Bupirimate, Buprofezin, Butachlor, Cadusafos, Carbaryl, Carbendazim, Carbofuran, Carbofuran 3-Oh, Carboxin, Carfentrazone-Ethyl, Chlorantraniliprole, Chlordimeform Free Base, Chlorfevinphos, Chlorfluazuron, Chloridazone, Chlorimuron Ethyl, Chlorpropham, Chlorpyrifos Ethyl, Chlorpyrifos Methyl, Chlorsulfuron, Chlortoluron, Chromafenozide, Clethodim Sulfone, Clethodim Sulfoxide, Clofentezin, Clomazone, Clothianidin, Coumaphos, Coumoxystrobin, Cyanazine, Cyantraniliprole, Cyazofamid, Cyazofamid- Dessulfonamide, Cyclosulfamuron, Cycloxydim, Cyflufenamid, Cyflumetofen, Cymoxanil, Cyproconazole, Cyprodinil, Deltamethrin, Demeton S Methyl Sulfone, Demeton S Methyl Sulfoxide, Demeton-S Methyl, Diazinon, Dichlorvos, Diclobutrazol, Diclofop Methyl, Dicrotophos, Diethofencarb,	In house multi-residue method, OE08-110 employing Liquid Chromatography-Mass Spectrometry LC-MS/MS, based on QuEChERS EN 15662:2018

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
sugar content: honey, jams etc. • Honey • Raisins • Jam • Figs, molasses etc. *(ESYD G-FYTOPROST/01/02/20-10-2016-* *PRODUCT CATEGORY 4.2-3 & SANTE/ 11312/2021)* (continued)	Difenoconazole, Diflubenzuron, Diflufenican, Dimepiperate, Dimethenamid, Dimethoate, Dimethomorph, Dimoxystrobin, Diniconazole, Dinotefuran, Disulfoton, Disulfoton-Sulfone, Disulfoton-Sulfoxide, Diuron, Dma, Dmf, Dmpf, Edifenphos, Emamectin-Benzoate-A, Emamectin-Benzoate-B, Epn, Epoxiconazole, Ethion, Ethiprol, Ethirimol, Ethofumesate, Ethoprophos, Ethoxysulfuron, Etofenprox, Etoxazole, Etrimfos, Famoxadone, Fenamidone, Fenamiphos, Fenamiphos Sulfone, Fenamiphos Sulfoxide, Fenarimol, Fenazaquin, Fenbuconazole, Fenhexamide, Fenobucarb, Fenothiocarb, Fenoxanil, Fenoxycarb, Fenpropathrin, Fenpropidin, Fenpropimorph, Fenpyrazamine, Fenpyroximate, Fensulfothion, Fensulfothion Sulfone, Fensulfothion-Oxon, Fensulfothion-Oxon-Sulfone, Fenthion, Fenthion Sulfone, Fenthion Sulfoxide, Flonicamid, Florasulam, Fluazifop P Butyl, Flubendiamide, Fludioxonil, Flufenacet, Flufenoxuron, Flumetralin, Flumetsulam, Fluopicolide, Fluopyram, Fluoroglycofen Ethyl, Flurtamon, Flusilazole, Fluthiacet Methyl, Flutolanil, Flutriafol, Fluxapyroxad, Fonofos, Forchlorfenuron, Fosthiazate, Halosulfuron Methyl, Heptenophos, Hexaconazole, Hexazinone, Hexythiazox, Imazalil, Imibenconazole, Imidacloprid, Indoxacarb, Ipconazole, Iprobenphos, Iprovalicarb, Isazophos, Isocarbofos, Isophenphos Methyl, Isoprocarb, Isoprothiolane, Isoproturon, Isopyrazam, Isoxaflutole, Ivermectin, Kresoxim Methyl, Lactofen, Linuron, Lufenuron, Malaoxon, Malathion, Mandipropamid, Mefenacet, Mepronil, Mesosulfuron Methyl, Metaflumizone, Metalaxyl Total, Metamifop, Metamitron, Metazachlor, Metconazole, Methacrifos, Methamidophos, Methidathion, Methiocarb, Methiocarb Sulfone, Methiocarb Sulfoxide, Methomyl, Methoxyfenozide, Metolachlor, Metolcarb, Metrafenone, Metribuzin, Metsulfuron Methyl, Mevinphos Cis, Mevinphos Trans, Molinate, Monocrotophos, Myclobutanil, Napropamid, Nitenpyram, Novaluron, Omethoate, Oxadiargyl, Oxadixyl, Oxamyl, Oxamyl-Oxine, Oxaziclomefone, Paclobutrazole, Parathion Ethyl, Penconazole, Pencycuron, Pendimethalin, Penflufen, Penoxsulam, Penthiopyrad, Phenamacril, Phenmedipham, Phenthoate, Phorate Sulfone, Phorate Sulfoxide, Phosalone, Phosfolan, Phosmet, Phosmetoxon, Phosphamidon, Phospholan-Methyl, Phoxim, Picolinafen, Picoxystrobin, Piperonyl Butoxide, Pirimicarb, Pirimicarb Desmethyl, Pirimicarb Desmethyl Formamido, Pirimiphos Methyl, Pretilachlor, Prochloraz, Profenofos, Promecarb, Prometryn, Propachlor, Propamocarb, Propanil, Propaquizafop, Propargite, Propiconazole, Propoxur, Propyzamide, Proquinazid, Prosulfocarb, Pyraclostrobin, Pyraflufen Ethyl, Pyrethrin I, Pyribenzoxim, Pyridaben, Pyridafenthion, Pyridalil, Pyriftalid, Pyrimethanil, Pyriproxyfen, Pyrisoxazole, Quinalphos, Quizalofop Ethyl, Rotenone, Saflufenacil, Sedaxane, Silthiofam, Simazine, Simetryn, Spinetoram, Spinosyn A, Spinosyn D, Spirodiclofen, Spiromesifen, Spirotetramat, Spirotetramat Enol Glucoside, Spirotetramat Keto Hydroxy, Spirotetramat Mono Hydroxy, Sulfotep, Sulfoxaflor, Tebuconazole, Tebufenozide, Tebuthiuron, Teflubenzuron, Terbufos, Terbufos Sulfone, Terbufos Sulfoxide, Terbuthylazine, Tetraconazole, Thiabendazole, Thiacloprid, Thiamethoxam, Thidiazuron, Thifluzamide, Thifensulfuron Methyl, Thiophanate Methyl, Tolclofos Methyl, Tolfenpyrad, Triadimefon, Triadimenol, Triallate, Triasulfuron, Triazophos, Tribenuron Metyhl, Tricyclazole, Trifloxystrobin, Triflumizole, Triflumizole Amino, Triflumuron, Triflusulfuron Methyl, Triticonazole, Tritosulfuron, Uniconazole, Vamidothion, Zoxamide	
19. Products with high	2. Residue-determination of agricultural drugs: 1,1-Dichloro-2,2-Bis(4-Ethylphenyl)Ethane, 2,3,5,6-Tetrachloroaniline, 2,4'-Methoxychlor, 2-Phenylphenol, 4,4'-Dichlorobenzophenone, 4,4'-Methoxychlor Olefin, Acetochlor, Acrinathrin, Alachlor, Aldrin, Allethrin-3,4 (Bioallethrin), Allidochlor, alpha-BHC, alpha-Endosulfan, Anthraquinone, Atrazine, Azinphos-Ethyl, Azinphos-Methyl, Benfluralin, beta-BHC, beta-Endosulfan, Bifenthrin, Bromfenvinfos-Methyl,	In house multi-residue method, OE08-110 employing Liquid Chromatography-Mass Spectrometry GC-MS/MS, based on QuEChERS

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
sugar content: honey, jams etc. • Honey • Raisins • Jam • Figs, molasses etc. *(ESYD G-FYTOPROST/01/02/20-10-2016- PRODUCT CATEGORY 4.2-3 & SANTE/ 11312/2021)* (continued)	Bromfenvinphos, Bromophos, Bromophos-Ethyl, Bromopropylate, Bupirimate, Carbophenothion, Carfentrazone-Ethyl, Chlorbenside, Chlorfenapyr, Chlorfenson, Chlorobenzilate, Chlorothalonil, Chlorpropham, Chlorpyrifos, Chlorpyrifos-Methyl, Chlorthal-Dimethyl, Chlorthiophos, (E)-Chlorfenvinphos, (Z)-Chlorfenvinphos, Chlozolinate, cis-Chlordane, trans-Chlordane, Clomazone, Coumaphos, Cycloate, Cyfluthrin, Cypermethrin, Cyprodinil, delta-BHC, Deltamethrin, Di-allate, Diazinon, Dichlobenil, Dichlofluanid, Dicloran, Dieldrin, Dimethachlor, Diphenamid, Diphenylamine, Disulfoton, Edifenphos, Endosulfan Ether, Endosulfan Sulfate, Endrin, Endrin Ketone, EPN, Ethalfluralin, Ethion, Etofenprox, Etridiazole, Fenamiphos, Fenarimol, Fenchlorphos, Fenitrothion, Fenpropathrin, Fenson, Fenthion, Fenvalerate, Fipronil, Fluazifop-P-Butyl, Flucythrinate, Fludioxonil, Fluquinconazole, Fluridone, Flusilazole, Flutolanil, Flutriafol, Folpet, Fonofos, gamma-BHC (Lindane), Heptachlor, Heptachlor-endo-epoxide, Heptachlor-exo-epoxide, Hexazinone, Iodofenphos, Iprodione, Isazofos, Isodrin, Isopropalin, lambda-Cyhalothrin, Lenacil, Leptophos, Linuron, Malathion, Metalaxyl (Mefenoxam), Metazachlor, Methacrifos, Methoxychlor, Metolachlor (S-Metolachlor), Mevinphos, MGK 264, Mirex, Myclobutanil, N-(2,4-Dimethylphenyl) Formamide, Nitralin, Nitrofen, cis-Nonachlor, trans-Nonachlor, Norflurazon, o,p'-DDD, o,p'-DDE, o,p'-DDT, Oxadiazon, Oxyfluorfen, p,p'-DDD, p,p'-DDE, p,p'-DDT, Paclobutrazol, Parathion, Parathion-Methyl, Pebulate, Penconazole, Pendimethalin, Pentachloroaniline, Pentachloroanisole, Pentachlorobenzene, Pentachlorobenzonitrile, Pentachlorothioanisole, cis-Permethrine, trans-Permethrine, Phenothrin, Phorate, Phosalone, Phosmet, Piperonyl Butoxide, Pirimiphos-Ethyl, Pirimiphos-Methyl, Pretilachlor, Prochloraz, Procymidone, Prodiamine, Profenofos, Profluralin, Propachlor, Propanil, Propargite, Propisochlor, Propyzamide, Prothiofos, Pyraclofos, Pyrazophos, Pyridaben, Pyridaphenthion, Pyrimethanil, Pyriproxyfen, Quinalphos, Quintozene, Resmethrin, Resmethrin-2 (Bioresthrin), Sulfotep, Sulprofos, tau-Fluvalinate, Tebuconazole, Tebufenpyrad, Tecnazene, Terbacil, Terbufos, Terbuthylazine, Tetrachlorvinphos, Tetradifon, Tetramethrin, THPI (Tetrahydrophthalimide), Tolclofos-Methyl, Tolylfluanid, Transfluthrin, Triadimefon, Triadimenol, Tri-allate, Triazophos, Tricyclazole, Triflumizole, Trifluralin, Vinclozolin	EN 15662:2018
20. French fries' potato (& chips), cereals products and coffee.	Determination of Acrylamide	In house multi-residue method, OE08-118 employing Liquid Chromatography-Mass Spectrometry LC-MS/MS, based on QuEChERS EN 15662:2018
Sensory (Organoleptic) tests		
1. Water potable, surface and groundwater for human consumption or not	1. Determination of the threshold odour number (TON) and threshold flavour number (TFN)	In house method OE08-108 based on EN 1622:2006
Microbiological tests		
1. Food and animal feeding stuffs	1. Detection of *Salmonella* spp. except *S. typhi* and *paratyphi*	ISO 6579-1:2017/Amd 1:2020
	2. Detection of *Listeria* spp και *Listeria monocytogenes*	ISO 11290-1:2017
	3. Enumeration of beta-glucuronidase-positive *Escherichia coli*	ISO 16649-2:2001
	4. Enumeration of coagulase-positive staphylococci	ISO

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
	(*Staphylococcus aureus* and other species)	6888-2:2021/Amd1:2023
	5. Enumeration of culturable micro-organisms at 30ºC	ISO 4833-1:2013
	6. Enumeration of *Listeria* spp και *Listeria monocytogenes*	ISO 11290-2:2017
	7. Enumeration of coliforms	ISO 4832:2006
	8. Enumeration of *Enterobacteriaceae*	ISO 21528-2:2004
	9. Enumeration of *Clostridium perfringens*	ISO 15213-2:2023
	10. Enumeration of lactic acid bacteria at 30ºC	ISO 15214:1998
	11. Detection of *Campylobacter spp*.	ISO 10272-1:2017
	12. Detection and enumeration of *Campylobacter spp*.	ISO 10272-2:2017
	13. Enumeration of presumptive *Bacillus cereus*-Colony-count technique at 30^0 C	ISO 7932:2004
2. Food and animal feeding stuffs with aw> 0,95	Enumeration of yeasts and moulds	ISO 21527-1:2008
3. Food and animal feeding stuffs with aw ≤ 0,95	Enumeration of yeasts and moulds	ISO 21527-2:2008
4. Raw milk	1. Detection of antimicrobial residues [β-lactames (amoxicillin, ampicillin, cephalexin, cephapirin, desacetylcefapirin, cefapirin benzathin, cephalonium, ceftiofur, cefazolin, cefoperazone, cloxacillin, oxacillin, nafcillin, penethamate, penicillin G), sulfonamides (sulfadiazine,sulfadimethoxine, sulfadoxine, sulfamethoxypyridazine, sulfathiazole), tetracyclines (chlorotetracycline, doxycycline, tetracycline, oxytetracycline], macrolides (tylosin, lincomycin), aminoglycosides (gentamicin, neomycin), dapsone, rifaximin]	Diffusion method, ECLIPSE 4G
	2. Enumeration of somatic cells	ISO 13366-1:2008/COR 1:2009
5. Potable water, surface water and swimming pool water Water with low background (Matrix A)	Detection and enumeration of *Legionella spp.*	ISO 11731:2017 procedures 5, 7 Media A ISO 11731:2017 procedures 8, 9, 10 Media A and B
6. Potable water, surface water and swimming pool water Water with high background (Matrix B)	Detection and enumeration of *Legionella spp.*	ISO 11731:2017 procedures 8, 9, 10 Media C
7. Legionella isolates from Potable water, surface water and swimming pool water Water with low & high background	1. Identification of Legionella spp: • *L. pneumophila Serogroup 1,* • *L. pneumophila Serogroups 2-14*	*Legionella latex test OXOID DR0800M*

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
8. Potable water, surface water and swimming pool water	1. Enumeration of culturable micro-organisms at 22ºC and 36ºC	ISO 6222:1999
	2. Detection and enumeration of *Pseudomonas aeruginosa*	ISO 16266:2006
	3. Enumeration of *Escherichia coli* and coliform bacteria for waters with low bacterial counts	ISO 9308-1:2014/Amd 1:2016
	4. Detection and enumeration of intestinal enterococci	ISO 7899-2:2000
	5. Detection of *Salmonella* spp	ISO 19250:2010
	6. Enumeration of *Clostridium. perfringens*	ISO 14189:2013
	7. Detection and enumeration of Fecal Coliforms	APHA* 9222D
9. Sea water	1. Enumeration of Total Coliforms bacteria	ISO 9308-1:2014/Amd 1:2016
	2. Enumeration of *Escherichia coli*	ISO 9308-1:2014/Amd 1:2016
	3. Detection and enumeration of intestinal enterococci	ISO 7899-2:2000
	4. Detection of *Salmonella* spp	ISO 19250:2010
10. Water for hemodialysis and relevant treatments	1. Enumeration of total culturable microorganisms at 20°C	ISO 23500-3:2019
	2. Determination of Bacterial Endotoxins	European pharmacopoeia 2.6.14. Method A (gel clot: limit test), Method B (gel clot: quantitative)
11. Wastewater & Wastes, Surface Water	1. Detection and enumeration of *Escherichia coli*	ISO 9308-3:1998
	2. Detection and enumeration of Total Coliforms	APHA* 9222B
	3. Detection and enumeration of intestinal enterococci	ISO 7899-2:2000
	4. Detection of *Salmonella* spp	ISO 19250:2010
	5. Detection and enumeration of Fecal Coliforms	APHA* 9222D
12. Animal faeces and environmental samples from the primary production stage	Detection of *Salmonella* spp. except *S. typhi* and *paratyphi*	ISO 6579-1:2017/Amd 1:2020
13. Surface & Environmental samples from food production and handling areas	1. Detection of *Salmonella* spp. except *S*. typhi and *paratyphi*	ISO 6579-1:2017/Amd 1:2020
	2. Detection of *Listeria spp* and *Listeria monocytogenes*	ISO 11290-1:2017
	3. Enumeration of *Listeria spp* and *Listeria*	ISO 11290-2:2017

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
	monocytogenes	
	4. Detection and enumeration of aerobic microorganisms at 30 °C	ISO 4833-1:2013/Amd 1:2022
	5. Detection and enumeration of *Enterobacteriaceae*	ISO 21528-2:2017
	6. Detection and enumeration of κολοβακτηριοειδών στους 30 °C	ISO 4832:2006
	7. Detection and enumeration of beta-glucuronidase-positive *Escherichia coli*	ISO 16649-2:2001
	8. Detection and enumeration of coagulase-positive staphylococci (*Staphylococcus aureus* and other species)	ISO 6888-2:2021
14. Fertilizers (Organic, Organo-mineral and Inorganic)	1. Detection of *Salmonella* spp.	CEN/TS 17780:2022
	2. Detection and enumeration of *Escherichia coli*	CEN/TS 17781:2022
15. Samples from the primary production stage (hair sheep) as growing media and soil improvers	Detection *Salmonella* spp. (except *S.Typhi* & *S. Paratyphi*)	ISO 6579-1:2017
	Detection and enumeration beta-glucuronidase-positive *Escherichia coli*	ISO 16649-2:2001
	Detection and enumeration of *Enterobacteriaceae*	ISO 21528-2:2017
	Detection and enumeration of *C. perfringens*	ISO 15213-2:2023
Sampling		
1. Waters from lakes and swimming pools, drinking waters, marine waters, waste waters	1. Determination of chemical parameters	ISO 5667-1:2020 ISO 5667-3:2018 ISO 5667-4:2016 ISO 5667-5:2006 ISO 5667-9:1992 ISO 5667-10:2020 ISO 5667-11:2009 ISO 5667-14:2014
1. Waters from lakes and swimming pools, drinking waters, marine waters, waste waters (continued)	2. Microbiological investigations	ISO 19458:2006 ISO 5667-1:2020 ISO 5667-3:2018 ISO 5667-4:2016 ISO 5667-5:2006 ISO 5667-9:1992 ISO 5667-10:2020 ISO 5667-11:2009 ISO 5667-14:2014 Directive 2006/7/EC
2. Samples from surfaces using swabs	Horizontal methods for sampling techniques for microbiology tests	ISO 18593:2018
3.Samples from surface of	Microbiology of the food chain – Carcass sampling	ISO 17604:2015

Materials / Products tested	Types of test / Properties measured	Applied methods / Techniques used
carcasses & parts of carcasses	for microbiological analysis	

***American Public Health Association, American Water Works Association, Water Environment Federation, "Standard Methods for the Examination of Water and Wastewater", 24th Edition, 2023.*

Site of assessment: **Laboratory permanent premises, 2 M. Eleftheriadis Str., GR-71601, N. Alikarnassos, Heraklion, Greece.**
Approved signatories: **A. Stefanakis, A. Ftylaki**

This scope of Accreditation replaces the previous one dated 05.06.2025.
The Accreditation Certificate No. **518**-5, to ELOT EN ISO/IEC 17025:2017, is valid until 03.03.2030.

Athens, 5 August 2026

Konstantinou Evangelos Apostolos
CEO of ESYD