(			Pesticide Toxicology Division, National Institute of Occupational Health (ICMR, Govt. of India), Meghani Nagar, Ahmedabad, Gujarat			
Accı	reditation Standa	rd ISO/IEC 17025: 2005				
Disc	ipline	<b>Chemical Testing</b>	ls	sue Date	13.01.2015	
Cert	ificate Number	T-2370	V	alid Until	12.01.2017	
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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed		e of Testing / s of Detection	
I.	WATER					
1.	Drinking and	Organochlorine Pesticides				
River Water $\alpha \ BHC \qquad \qquad NIOH/SOP/C/23 \\ (Issue No. 01,Issue Date :05.06) \\ \beta \ BHC \qquad \qquad EPA \ Method-680$ $\gamma \ BHC$	River Water	α ΒΗС			g/L to 1000 μg/L	
	*	0.1 μ <u>ε</u>	g/L to 1000 μg/L			
		ү ВНС		0.1 με	g/L to 1000 μg/L	
		δ ΒΗС		0.1 με	g/L to 1000 μg/L	
		α Endosulfan		0.1 με	g/L to 1000 μg/L	
		β Endosulfan		0.1 με	g/L to 1000 μg/L	
		Endosulfan Sulfate		0.1 με	g/L to 1000 μg/L	
		pp' DDE		0.1 με	g/L to 1000 μg/L	
		pp' DDD		0.1 με	g/L to 1000 μg/L	
		pp'DDT		0.1 με	g/L to 1000 μg/L	
		Aldrin		0.1 με	g/L to 1000 μg/L	
		Heptachlor		0.1 με	g/L to 1000 μg/L	
		Organophosphorous Pesticide	es			
		Chlorpyrifos	NIOH/SOP/C/24	0.5	g/L to 1000 μg/L	
		Acephate	(Issue No.01,Issue Date:05.06.201 EPA Method-680	11)	g/L to 1000 μg/L	

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Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
Drinking and	Dichlorvos	NIOH/SOP/C/24	$0.5~\mu g/L~$ to $1000~\mu g/L$
River Water	Dimethoate	(Issue No.01,Issue Date:05.06.2011) EPA Method-680	$0.5~\mu g/L~$ to $1000~\mu g/L$
Dimethoate	$0.5~\mu g/L~$ to $1000~\mu g/L$		
	Ethion		$0.5~\mu g/L~$ to $1000~\mu g/L$
	Malathion		$0.5~\mu g/L~$ to $1000~\mu g/L$
	Methamidophos		$0.5~\mu\text{g/L}$ to $1000~\mu\text{g/L}$
	Monocrotophos		$0.5~\mu\text{g/L}$ to $1000~\mu\text{g/L}$
	Methyl Parathion		$0.5~\mu g/L~$ to $1000~\mu g/L$
	Phorate		$0.5~\mu g/L~$ to $1000~\mu g/L$
	Organophosphorus Pesticides		
Phosp	Phosphamidon	NIOH/SOP/C/24	$0.5~\mu g/L~$ to $1000~\mu g/L$
	Quinalfos (Issue No.01,Issue Date :05/06/2011)  EPA Method-680		
	Triazophos		
	Profenofos		
		Drinking and River Water  Dimethoate  Dimethoate  Ethion  Malathion  Methamidophos  Monocrotophos  Methyl Parathion  Phorate  Organophosphorus Pesticides  Phosphamidon  Quinalfos  Triazophos	Material of Test  Drinking and River Water  Dichlorvos Dimethoate Dimethoate Ethion Malathion Methamidophos Monocrotophos Methyl Parathion Phorate  Organophosphorus Pesticides Phosphamidon Quinalfos Triazophos  Triazophos  NIOH/SOP/C/24 (Issue No.01, Issue Date:05.06.2011) EPA Method-680  NIOH/SOP/C/24 (Issue No.01, Issue Date:05/06/2011) EPA Method-680  Triazophos

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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
	Drinking and River Water	Synthetic Pyrethroids		
		$\alpha$ - Cypermethrin	In house Method:	$0.5~\mu g/L$ to $5000~\mu g/L$
		Deltamethrin	NIOH/SOP/C/25	0.5 μg/L to 5000 μg/L
		Fenpropathrin	(Issue No.01 & Issue Date: 05/06/2011)	0.5 μg/L to 5000 μg/L
		Fenvalerate	EPA Method-680	$0.5~\mu g/L$ to $5000~\mu g/L$
		λ - Cyhalothrin		$0.5~\mu g/L$ to $5000~\mu g/L$
		Cyflutrhin		$0.5~\mu\text{g/L}$ to $5000~\mu\text{g/L}$
		Pendimethalin		$0.5~\mu g/L$ to $5000~\mu g/L$
		Herbicides		
		Alachlor	NIOH/SOP/C/25	$0.5 \mu g/L$ to $5000 \mu g/L$
		Butachlor	(Issue No. 01 & Issue Date : 05/06/2011) EPA Method-680	
		Fluchloralin		

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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
	Drinking and River Water	Polychlorinated Biphenyls		
	River water	2,4'-Dichlorobiphenyl (PCB # 8)	NIOH/SOP/C/26 (Issue No. 01 & Issue Date : 05/06/2011) EPA Method-680	$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2',4-Trichlorobiphenyl (PCB # 17)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2',5- Trichlorobiphenyl (PCB # 18)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,4,4'- Trichlorobiphenyl (PCB # 28)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,4',5- Trichlorobiphenyl (PCB # 31)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2',3,4- Trichlorobiphenyl (PCB # 33)		$0.1~\mu g/L$ to $1000~\mu g/L$
		3,4,4'- Trichlorobiphenyl (PCB # 37)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2', 3,5'- Tetrachlorobiphenyl (PCB # 44)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2', 3,6'- Tetrachlorobiphenyl (PCB # 46)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2', 4,5'- Tetrachlorobiphenyl (PCB # 49)		$0.1~\mu g/L$ to $1000~\mu g/L$
				0.1 μg/

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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
	Drinking and	2,3', 4,4'- Tetrachlorobiphenyl	NIOH/SOP/C/26	$0.1~\mu g/L$ to $1000~\mu g/L$
	River Water	(PCB # 66)	(Issue No. 01 &	
		2,3',4',5- Tetrachlorobiphenyl (PCB # 70)	Issue Date : 05/06/2011) EPA Method-680	$0.1~\mu g/L$ to $1000~\mu g/L$
		2,4,4',5- Tetrachlorobiphenyl (PCB # 74)		0.1 μg/L to 1000 μg/L
		3,3', 4,4'- Tetrachlorobiphenyl (PCB # 77)		0.1 μg/L to 1000 μg/L
		2,2', 3,4, 5'- Pentachlorobiphenyl (PCB # 87)		0.1 μg/L to 1000 μg/L
		2,2', 4, 4',5- Pentachlorobiphenyl (PCB # 99)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,2', 4, 5,5'- Pentachlorobiphenyl (PCB # 101)		0.1 μg/L to 1000 μg/L
		2,3,3', 4', 6- Pentachlorobiphenyl (PCB # 110)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,3,4, 4', 5- Pentachlorobiphenyl (PCB # 114)		0.1 μg/L to 1000 μg/L
		2,3',4, 4', 5- Pentachlorobiphenyl (PCB # 118)		0.1 μg/L to 1000 μg/L

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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
	Drinking and River Water	2, 2', 3,3', 4, 6'- Hexachlorobiphenyl (PCB # 132)	NIOH/SOP/C/26 (Issue No. 01 & Issue Date : 05/06/2011)	0.1 μg/L to 1000 μg/L
		2, 2', 3,4,4', 5'- Hexachlorobiphenyl (PCB # 138)	EPA Method-680	0.1 μg/L to 1000 μg/L
		2, 2', 3, 4,5, 6'- Hexachlorobiphenyl (PCB # 143)		0.1 μg/L to 1000 μg/L
		2, 2', 3,4', 5', 6- Hexachlorobiphenyl (PCB # 149)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2, 2', 4,4', 5, 5'- Hexachlorobiphenyl (PCB # 153)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2, 3,3', 4,4', 6- Hexachlorobiphenyl (PCB # 158)		0.1 μg/L to 1000 μg/L
		2, 3, 4,4', 5,6 – Hexachlorobiphenyl (PCB # 166)		$0.1~\mu g/L$ to $1000~\mu g/L$
		2,3',4,4',5,5' - Hexachlorobiphenyl (PCB # 167)		0.1 μg/L to 1000 μg/L
		3, 3', 4,4', 5, 5'- Hexachlorobiphenyl (PCB # 169)		0.1 μg/L to 1000 μg/L

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	Drinking and River Water	2, 2', 3,3', 4,4', 5- Heptachlorobiphenyl (PCB # 170)	NIOH/SOP/C/26 (Issue No. 01 & Issue Date : 05/06/2011)	$0.1~\mu g/L$ to $1000~\mu g/L$
		2, 2', 3,3', 4', 5, 6- Heptachlorobiphenyl (PCB # 177)	EPA Method-680	0.1 μg/L to 1000 μg/L
		2, 2', 3,3', 5,6, 6'- Heptachlorobiphenyl (PCB # 179)		0.1 μg/L to 1000 μg/L
		2, 2', 3, 4,4', 5',6- Heptachlorobiphenyl (PCB # 183)		0.1 μg/L to 1000 μg/L
		2, 2', 3, 4', 5,5', 6- Heptachlorobiphenyl (PCB # 187)		0.1 μg/L to 1000 μg/L
		2, 3,3', 4,4', 5, 5'- Heptachlorobiphenyl (PCB # 189)		0.1 μg/L to 1000 μg/L
		2, 2', 3,3', 4,4', 5, 5'- Octachlorobiphenyl (PCB # 194)		0.1 μg/L to 1000 μg/L
		2, 2', 3,3', 4,4', 5, 6- Octachlorobiphenyl (PCB # 195)		0.1 μg/L to 1000 μg/L
		2, 3,3', 4,4', 5, 5', 6- Octachlorobiphenyl (PCB # 205)		0.1 μg/L to 1000 μg/L

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	Drinking and River Water	2, 2', 3,3', 4,4', 5, 5',6- Nonachlorobiphenyl (PCB # 206)	NIOH/SOP/C/26 (Issue No. 01 & Issue Date : 05/06/2011) EPA Method-680	$0.1~\mu g/L$ to $1000~\mu g/L$
		2, 2', 3,3', 4, 5, 5', 6,6'- Nonachlorobiphenyl (PCB # 208)		0.1 μg/L to 1000 μg/L
		2, 2', 3,3', 4, 4', 5, 5', 6,6'- Decachlorobiphenyl (PCB # 209)		0.1 μg/L to 1000 μg/L
II.	fruits and Organochlorine Pesticides AOAC (19 <sup>th</sup> Edition, 2012)			
	vegetables	α ВНС	NIOH/SOP/C/20 (Issue No. 01 & Issue Date : 05/06/2011)	$10~\mu g/kg$ to $1000~\mu g/kg$
		β ВНС		$10 \mu g/kg$ to $1000 \mu g/kg$
		ү ВНС		$10 \mu g/kg$ to $1000 \mu g/kg$
		δВНС		$10 \mu g/kg$ to $1000 \mu g/kg$
		Heptachlor		$10 \mu g/kg$ to $1000 \mu g/kg$
		α Endosulfan		$10 \mu g/kg$ to $1000 \mu g/kg$
		β Endosulfan		$10 \mu g/kg$ to $1000 \mu g/kg$
		Endosulfan Sulfate		10 μg/kg to 1000 μg/kg
		pp' DDE		10 μg/kg to 1000 μg/kg
		pp' DDD		10 μg/kg to 1000 μg/kg
				10 μg/kg to 1000 μg/kg
		pp'DDT		, , , , , , , , , , , , , , , , , , , ,
		Aldrin		10 μg/kg to 1000 μg/kg

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S.No.	Product / Material of Test	Specific Test Performed	Test Method Specification against which tests are performed	Range of Testing / Limits of Detection
	Fruits and Vegetables	Organophosphorous Pesticid	es	
	, egetables	Chlorpyrifos	AOAC (19 <sup>th</sup> Edition, 2012)	$50 \mu g/kg$ to $1500 \mu g/kg$
		Acephate	NIOH/SOP/C/21 (Issue No. 01 & Issue Date : 05/06/2011)	$50 \mu g/kg$ to $1500 \mu g/kg$
		Dichlorvos	AOAC (19 <sup>th</sup> Edition, 2012) NIOH/SOP/C/21	$50 \mu g/kg$ to $1500 \mu g/kg$
		Dimethoate	(Issue No. 01 & Issue Date : 05/06/2011)	50 μg/kg to 1500 μg/kg
		Ethion	Issue Date : 05/00/2011)	50 μg/kg to 1500 μg/kg
		Malathion		$50 \mu g/kg$ to $1500 \mu g/kg$
		Methamidophos		$50 \mu g/kg$ to $1500 \mu g/kg$
		Monocrotophos		50 μg/kg to 1500 μg/kg
		Methyl Parathion		$50 \mu g/kg$ to $1500 \mu g/kg$
		Phorate		$50~\mu g/kg$ to $1500~\mu g/kg$
		Organophosphorous Pesticid	es	
		Phosphamidon	AOAC (19 <sup>th</sup> Edition, 2012) NIOH/SOP/C/21	50 μg/kg to 1500μg/kg
		Quinalfos	(Issue No. 01 &	50 μg/kg to 1500μg/kg
		Triazophos	Issue Date : 05/06/2011)	$50 \mu g/kg$ to $1500 \mu g/kg$
		Profenophos		$50 \mu g/kg$ to $1500 \mu g/kg$

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	Fruits and Vegetables	Synthetic Pyrethroids		
	, <b>-g</b>	$\alpha$ - Cypermethrin	AOAC (19 <sup>th</sup> Edition, 2012) NIOH/SOP/C/22	$100 \mu g/kg$ to $1500 \mu g/kg$
		Bifenithrin	(Issue No. 01 & Issue Date : 05/06/2011)	$100 \mu g/kg$ to $1500 \mu g/kg$
	Deltamethrin	$100 \mu g/kg$ to $1500 \mu g/kg$		
		Fenpropathrin	AOAC (19 <sup>th</sup> Edition, 2012) NIOH/SOP/C/22 (Issue No. 01 & Issue Date : 05/06/2011)	$100 \mu g/kg$ to $1500 \mu g/kg$
		Fenvalerate		$100 \mu g/kg$ to $1500 \mu g/kg$
		λ - Cyhalothrin		$100 \mu g/kg$ to $1500 \mu g/kg$
		Pendimethalin		$100 \mu g/kg$ to $1500 \mu g/kg$
		Herbicides		
		Alachlor	AOAC (19 <sup>th</sup> Edition) 2012 NIOH/SOP/C/22	100 μg/kg to 1500 μg/kg
		Butachlor	(Issue No. 01 &	$100~\mu g/kg$ to $1500~\mu g/kg$
		Fluchloralin	Issue Date : 05/06/2011)	$100~\mu g/kg$ to $1500~\mu g/kg$
		Cyfluthrin		$100 \mu g/kg$ to $1500 \mu g/kg$
III.	Blood/Serum	Organochlorine Pesticides		
		α ВНС	NIOH/SOP/C/30	$10~\mu g/L$ to $1000~\mu g/L$
		β ВНС	(Issue No. 01 & Issue Date: 05/06/2011)	$10~\mu g/L$ to $1000~\mu g/L$
		ү ВНС	15540 5410 . 05/00/2011)	$10~\mu g/L$ to $1000~\mu g/L$
		δВНС		$10~\mu g/L$ to $1000~\mu g/L$

Rini Narayan Convenor N. Venkateswaran Program Manager

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	Blood/Serum	$\alpha$ Endosulfan	NIOH/SOP/C/30 (Issue No. 01 &	$10~\mu g/L$ to $1000~\mu g/L$
		β Endosulfan	Issue Date : 05/06/2011)	$10 \mu g/L$ to $1000 \mu g/L$
		Endosulfan Sulfate		$10~\mu g/L$ to $1000~\mu g/L$
		pp' DDE		$10~\mu g/L$ to $1000~\mu g/L$
		pp' DDD		$10~\mu g/L$ to $1000~\mu g/L$
		pp' DDT		$10~\mu g/L$ to $1000~\mu g/L$

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