		Т	emp	ora	al tre	en				
Species	Contaminant	Tissue	Location	n	Range	Factor				
Northern fulmar	POPs and THg	Eggs –	Prince Leopold Isl.	68-83	1975-2015 (15-18 years)	Diet (δ				
Thick-billed murre	POPs and THg	Eggs	Prince Leopold Isl.	63-80 53-65	1975-2014 (14-18 years) 1975-2015	Diet (8				
Caribou	THg	Eggs Kidney	Pooled herds	1026	(11-13 years) 1991-2015	Age				
Caribou	THg	Kidney	Porcupine herd	546	(25 years) 1991-2015	Age				
Caribou	THg	Kidney	Qamanirjuaq herd	166	(24 years) 2006-2015 (10 years)	Age				
Polar bear	POPs and THg	Fat, Liver	Western Hudson Ba (WHB) Southern Hudson B	ay 106-124	 1991/2007-2015 (9-15 years) 2007-2015 	5 None				
	r or s and mg		(SHB)		(7-8 years)	None				
CI		's 				lercury				
			BDE-	47		—сп ₃ mercurv				
α-HCH	<i>p,p</i> '-DDE	PCB-	153	PFOS		y				
 These I 	POPs are	e repr	esentative	of dif	ferent					
chemica	al classe	s and	are amon	g the	greatest					
contam	inants in	these	species							
	L	.ega	cy POF	S						
Most F	POPs we	re de	creasing	consis	stently in					
seabir	ds and p	olar b	ears							
Break	points ic	dentify	v changes	in trer	nds					
Most p	ost-brea	ikpoin	t trends w	ere de	ecreasir	Ŋ				
p,p'-D	DE was I	increa	asing in W	HB p	olar bea	rs				
post ≈	2004	o likol	v rolatad t	• •						
Dieak		e likei rulato	y related to	0.						
	- Reų	nate-r	elated fac	tors						
	 Chail 	anges	in biology	and/o	or ecolog	qv				
	New POPs									
Less c	onsisten	t trend	ds:							
	Rec	cent/c	urrent use	produ	ucts					
	Les	s per	sistent							
	- Met	tabolis	sm/enviror	nment	al					
	trar	nsform	nation	. 1						
		erent	transport	Dathw	ays (PF)	US)				
BDE4	/ was ind	creas	ing, excep	ot in Se	eapiros a	at				
PFOS	was dec	reasi	ng eycen	t in W	'HR heai	rs				
Breakpoi	nts:					10				
BDE47	7 (early 2	2000's), PFOS (I	ate 20	000's)					
Decre	asing in	most	of the rece	ent tin	ne-frame	es				
		Me	ercury							
 Total r 	nercury (THg)	concentra	tions	showed					
spatia	l and spe	ecies-s	specific va	riatior	ו					
THg w	as <mark>incre</mark>	asing	in seabir	ds and	d WHB b	pears				
May b	e decrea	asing	in SHB be	ears (ii	nsignific	ant)				
May b	e increa	sing i	n Qamani	rjuaq	caribou					
(insign	niticant)				.	k -				
Linear Brookpai	trends v	vere d	ecreasing		orcupine	e nero				
	<u>ills</u> : d tranda	at DI	roversed	in the	mid_10 د	۱۵ ۵' م				
	ntlv decr	easin			ノ IIIU- I IJ	503				
No sin	nificant a	chang	es in pola	bear	S					
Porcu	pine and	poole	d barren d	ground	d caribou	J				
decre	ased from	m 199	$1 \approx 2000$	hen i	ncrease	d				



g _e concentration	r ²	<i>p</i> -value	Covariates	Equation	Trend					
HCH, wet weight]	0.27	0.069	None	= (-0.103 × Year) + 199	Decreasing					
ljusted means)	0.59	0.012	Arctic oscillation (AO)	= (-0.100 × Year) + (-1.08 × AO) + 207.9	Decreasing					
			(June only)							
<i>p'</i> -DDE, wet weight]	0.73	< 0.001	None	= (-0.038 × Year) + 75	Decreasing					
ljusted means)	0.85	< 0.001	Sea-ice freeze-up	= (-0.351 × Year) + (-1.98 × Freeze-up) +	Decreasing					
			date (50% TAC) ^b	+ [0.001 × (Year × Freeze-up)] + 703						
			(Ordinal/Julian date)							
CB-153, lipid weight]	0.64	0.001	None	= (-0.0350 × Year) + 68.4	Decreasing					
adjusted means) ^C	0.87	< 0.001	Sea-ice break-up	= (0.383 × Year) + (4.53 × Break-up) +	Increasing					
			date (50% TAC) ^d	+ [-0.002 × (Year × Break-up)] - 771						
			(Ordinal/Julian date)							
oncentrations that have b	ncentrations that have been adjusted for trophic position (diet), were adjusted using the δ^{15} N ratio									
eze-up was the ordinal date (weekly resolution) when the total accumulated coverage (TAC) of sea-ice was > 50 % TAC or > 10 % TAC										
phic position-adjusted concentrations were not significant for this interaction ("Year" <i>p</i> -value = 0.065)										
eak-up was tested as the	eak-up was tested as the ordinal dates (weekly resolution) when the TAC was < 50% or < 30%									

