

Table 3. Regression coefficient between dioxin concentrations in maternal blood and their smoking status

	Smoking status			
	Non-smoking (n = 173)	Quitting smoking (n = 53)	Continuous smoking (n = 37)	p-value
^a Dependent log _e dioxins (pg/g lipid)	e ^β (95% CI)	e ^β (95% CI)	e ^β (95% CI)	p-value
<Total>				
Total PCDDs	Ref.	0.957 (0.853, 1.074)	0.881 (0.766, 1.013)	0.074
Total PCDFs	Ref.	0.900 (0.809, 1.003)	0.854 (0.749, 0.972)	0.018*
Total PCDDs/PCDFs	Ref.	0.954 (0.852, 1.068)	0.878 (0.766, 1.008)	0.064
Total non-ortho PCBs	Ref.	0.908 (0.802, 1.027)	0.797 (0.686, 0.927)	0.003**
Total mono-ortho PCBs	Ref.	0.934 (0.809, 1.078)	0.836 (0.702, 0.996)	0.045*
Total dioxin-like PCBs	Ref.	0.934 (0.809, 1.078)	0.836 (0.702, 0.995)	0.044*
Total dioxins	Ref.	0.934 (0.813, 1.074)	0.839 (0.708, 0.993)	0.041*
<WHO-2005>				
Total PCDDs TEQ	Ref.	0.969 (0.860, 1.090)	0.885 (0.766, 1.023)	0.098
Total PCDFs TEQ	Ref.	0.946 (0.845, 1.058)	0.884 (0.772, 1.013)	0.077
Total PCDDs/PCDFs TEQ	Ref.	0.961 (0.858, 1.076)	0.882 (0.769, 1.012)	0.074
Total non-ortho PCBs TEQ	Ref.	0.851 (0.725, 1.001)	0.704 (0.579, 0.856)	0.001**
Total mono-ortho PCBs TEQ	Ref.	0.933 (0.808, 1.078)	0.832 (0.698, 0.992)	0.040*
Total dioxin-like PCBs TEQ	Ref.	0.857 (0.732, 1.005)	0.714 (0.589, 0.866)	0.001**
Total dioxins TEQ	Ref.	0.924 (0.821, 1.040)	0.826 (0.715, 0.953)	0.009**

TEQ; toxicity equivalency quantity. WHO; World Health Organization.

Statistically significant differences using the multiple linear regression analysis were denoted by * $p < 0.05$, ** $p < 0.01$, and *** $p < 0.001$.

Adjusted for age, BMI, parity, educational level, alcohol intake during pregnancy, caffeine intake during pregnancy, fish intake during pregnancy and blood measurement period.

^aBecause dioxin levels were log_e-transformed, β coefficients represent the e^β-fold change in dependent dioxins of quitting or continuous smoking compare with the non-smoking as a reference.

Table 4. Regression coefficient between concentrations of each dioxin congener in maternal blood and their smoking status

	Smoking status				p-value
	Non-smoking (n = 173)	Quitting smoking (n = 53)	Continuous smoking (n = 37)		
		e ^β (95% CI)	e ^β (95% CI)	e ^β (95% CI)	
^a Dependent log _e dioxins (pg/g lipid)					
<PCDDs>					
2,3,7,8-TCDD	Ref.	0.799 (0.680, 0.939)	0.007**	0.848 (0.697, 1.031)	0.098
1,2,3,7,8-PeCDD	Ref.	1.021 (0.887, 1.175)	0.772	0.902 (0.761, 1.070)	0.238
1,2,3,4,7,8-HxCDD	Ref.	0.918 (0.792, 1.062)	0.246	0.809 (0.677, 0.967)	0.020*
1,2,3,6,7,8-HxCDD	Ref.	1.019 (0.893, 1.164)	0.775	0.925 (0.787, 1.087)	0.342
1,2,3,7,8,9-HxCDD	Ref.	0.930 (0.781, 1.105)	0.405	0.848 (0.687, 1.047)	0.125
1,2,3,4,6,7,8-HpCDD	Ref.	0.873 (0.779, 0.978)	0.019*	0.742 (0.645, 0.851)	< 0.001***
OCDD	Ref.	0.959 (0.852, 1.079)	0.488	0.886 (0.768, 1.023)	0.098
<PCDFs>					
2,3,7,8-TCDF	Ref.	0.852 (0.740, 0.981)	0.026*	0.843 (0.710, 1.000)	0.050*
1,2,3,7,8-PeCDF	---	---	---	---	---
2,3,4,7,8-PeCDF	Ref.	0.980 (0.856, 1.122)	0.774	0.916 (0.776, 1.079)	0.289
1,2,3,4,7,8-HxCDF	Ref.	0.918 (0.787, 1.070)	0.272	0.817 (0.678, 0.985)	0.035*
1,2,3,6,7,8-HxCDF	Ref.	0.874 (0.747, 1.022)	0.091	0.809 (0.669, 0.979)	0.030*
2,3,4,6,7,8-HxCDF	---	---	---	---	---
1,2,3,7,8,9-HxCDF	---	---	---	---	---
1,2,3,4,6,7,8-HpCDF	Ref.	0.823 (0.657, 1.029)	0.088	0.733 (0.558, 0.964)	0.026*
1,2,3,4,7,8,9-HpCDF	---	---	---	---	---
OCDF	---	---	---	---	---

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<Non-ortho PCBs>						
344'5'-TCB(#81)	---		---		---	---
33'44'-TCB(#77)	Ref.	0.957 (0.819, 1.119)	0.583	0.802 (0.663, 0.969)	0.022*	
33'44'5'-PeCB(#126)	Ref.	0.809 (0.679, 0.964)	0.017*	0.640 (0.518, 0.792)	< 0.001***	
33'44'55'-HxCB(#169)	Ref.	1.007 (0.872, 1.164)	0.920	0.976 (0.819, 1.164)	0.786	
<Mono-ortho PCBs>						
2'344'5'-PeCB(#123)	Ref.	0.856 (0.707, 1.036)	0.109	0.602 (0.478, 0.760)	< 0.001***	
23'44'5'-PeCB(#118)	Ref.	0.908 (0.776, 1.062)	0.225	0.773 (0.638, 0.935)	0.008**	
2344'5'-PeCB(#114)	Ref.	1.107 (0.897, 1.368)	0.342	0.903 (0.699, 1.168)	0.435	
233'44'-PeCB(#105)	Ref.	0.886 (0.756, 1.038)	0.133	0.745 (0.614, 0.904)	0.003**	
23'44'55'-HxCB(#167)	Ref.	0.926 (0.794, 1.080)	0.324	0.899 (0.747, 1.084)	0.266	
233'44'5'-HxCB(#156)	Ref.	1.011 (0.885, 1.156)	0.869	1.003 (0.853, 1.179)	0.971	
233'44'5'-HxCB(#157)	Ref.	0.995 (0.860, 1.150)	0.945	0.992 (0.831, 1.184)	0.930	
233'44'55'-HpCB(#189)	Ref.	0.870 (0.731, 1.037)	0.119	0.899 (0.727, 1.111)	0.322	

TEQ; toxicity equivalency quantity. WHO; World Health Organization.

Statistically significant differences using the multiple linear regression analysis were denoted by * $p < 0.05$, ** $p < 0.01$, and *** $p < 0.001$.

Adjusted for age, BMI, parity, educational level, alcohol intake during pregnancy, caffeine intake during pregnancy, fish intake during pregnancy and blood measurement period.

^aBecause dioxin levels were log_e-transformed, β coefficients represent the e ^{β} -fold change in dependent dioxins of quitting or continuous smoking compare with the non-smoking as a reference.

IV 研究成果の刊行に関する一覧表

書籍

著者氏名	論文タイトル名	書籍全体の 編集者名	書籍名	出版社名	出版地	出版年	ページ
	なし						

雑誌

発表者氏名	論文タイトル名	発表誌名	巻号	ページ	出版年
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