

Table 2: Li⁺-Selective Electrodes

ionophore	membrane composition	lgK _{Li⁺,Bⁿ⁺}	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-1	Li⁺-1 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 66 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.4; K ⁺ , -0.4; Rb ⁺ , -1.0; Cs ⁺ , -0.6; NH ₄ ⁺ , -0.2; Mg ²⁺ , -0.8; Ca ²⁺ , -0.8; Sr ²⁺ , -0.7; Ba ²⁺ , -0.7	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
Li⁺-2	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 66 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.1; K ⁺ , -2.2; Rb ⁺ , -2.3; Cs ⁺ , -2.3; NH ₄ ⁺ , -2.2; H ⁺ , +0.8; Mg ²⁺ , -3.5; Ca ²⁺ , -2.8; Sr ²⁺ , -3.1; Ba ²⁺ , -3.0	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1–1.4 %), PVC (<i>w</i> = 33 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 30 %)	Na ⁺ , -2.2; K ⁺ , -2.2; Rb ⁺ , -2.2; Cs ⁺ , -2.1; NH ₄ ⁺ , -2.2; H ⁺ , +0.9; Mg ²⁺ , -3.0; Ca ²⁺ , -1.8; Sr ²⁺ , -1.9; Ba ²⁺ , -1.8	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1.4 %), PVC (<i>w</i> = 33 %), oNPOE (<i>w</i> = 65.6 %)	Na ⁺ , -2.0; K ⁺ , -2.2; Mg ²⁺ , -3.8; Ca ²⁺ , -2.6	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 20 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.2; K ⁺ , -2.2; Mg ²⁺ , -3.4; Ca ²⁺ , -1.9	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 33 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.3; K ⁺ , -2.2; Mg ²⁺ , -2.9; Ca ²⁺ , -1.7	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 40 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.2; K ⁺ , -2.0; Mg ²⁺ , -3.2; Ca ²⁺ , -1.5	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 45 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.0; K ⁺ , -1.8; Mg ²⁺ , -3.2; Ca ²⁺ , -1.3	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 50 %), PVC (<i>w</i> = 33 %)	Na ⁺ , +0.3; K ⁺ , +1.2; Mg ²⁺ , -0.7; Ca ²⁺ , +0.5	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 66 %), PVC (<i>w</i> = 33 %)	Na ⁺ , +0.6; K ⁺ , +1.4; Mg ²⁺ , -0.2; Ca ²⁺ , +0.8	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65.6 %)	Na ⁺ , +0.6; K ⁺ , +1.6; Mg ²⁺ , +0.2; Ca ²⁺ , +1.2	SSM	0.1	0.1	-	-	20–22 °C; r.o.o.g.	[1]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	KTPCIPB ($x_i = 85\%$), PVC ($w \approx 33\%$)								
	Li⁺-2 ($w = 1\%$), PVC ($w \approx 33\%$), oNPOE ($w \approx 65.6\%$), KTPCIPB ($x_i = 100\%$)	Na ⁺ , +0.6; K ⁺ , +1.8; Mg ²⁺ , +0.6; Ca ²⁺ , +1.4	SSM	0.1	0.1	–	–	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 ($w = 1\%$), PVC ($w \approx 33\%$), oNPOE ($w \approx 65.6\%$), KTPCIPB ($x_i = 120\%$)	Na ⁺ , +0.6; K ⁺ , +1.7; Mg ²⁺ , +0.3; Ca ²⁺ , +1.6	SSM	0.1	0.1	–	–	20–22 °C; r.o.o.g.	[1]
	Li⁺-2 ($w = 1-2\%$), oNPOE ($w = 64-66\%$), KTPCIPB ($x_i = 20\%$), PVC ($w = 31-33\%$)	Na ⁺ , –2.1; K ⁺ , –2.2; Mg ²⁺ , –3.0; Ca ²⁺ , –1.8	SSM	0.1	0.1	–	–	21 ± 1 °C	[2]
Li⁺-3	Li⁺-3 ($w = 1\%$), oNPOE ($w = 66\%$), PVC ($w = 33\%$)	Na ⁺ , –1.6; K ⁺ , –1.7; Rb ⁺ , –2.2; Cs ⁺ , –2.2; NH ₄ ⁺ , –2.0; H ⁺ , +1.1; Mg ²⁺ , –3.2; Ca ²⁺ , –3.1; Sr ²⁺ , –3.2; Ba ²⁺ , –3.0	SSM	0.1	0.1	–	–	20–22 °C; r.o.o.g.	[1]
	Li⁺-3 ($w = 1\%$), PVC ($w = 33\%$), oNPOE ($w = 65.6\%$), KTPCIPB ($x_i = 30\%$)	Na ⁺ , –1.3; K ⁺ , –1.4; Rb ⁺ , –1.7; Cs ⁺ , –1.6; NH ₄ ⁺ , –1.6; H ⁺ , +2.2; Mg ²⁺ , –3.3; Ca ²⁺ , –2.6; Sr ²⁺ , –2.8; Ba ²⁺ , –2.5	SSM	0.1	0.1	–	–	20–22 °C; r.o.o.g.	[1]
Li⁺-4	Li⁺-4 ($w = 1\%$), oNPOE ($w = 66\%$), PVC ($w = 33\%$)	Na ⁺ , –2.3; K ⁺ , –2.4; Rb ⁺ , –2.4; Cs ⁺ , –2.5; NH ₄ ⁺ , –2.4; H ⁺ , +0.6; Mg ²⁺ , –3.8; Ca ²⁺ , –3.2; Sr ²⁺ , –3.6; Ba ²⁺ , –3.4	SSM	0.1	0.1	–	–	20–22 °C; r.o.o.g.	[1]
	Li⁺-4 ($w = 1\%$), oNPOE ($w = 65.6\%$), KTPCIPB ($x_i = 30\%$), PVC ($w = 33\%$)	Na ⁺ , –2.3; K ⁺ , –2.6; Rb ⁺ , –2.8; Cs ⁺ , –2.8; NH ₄ ⁺ , –2.5; H ⁺ , +1.1; Mg ²⁺ , –4.0; Ca ²⁺ , –2.8; Sr ²⁺ , –2.9; Ba ²⁺ , –2.8	SSM	0.1	0.1	57	10 ^{–4} –10 ^{–1}	20–22 °C; r.o.o.g.	[1]
		Na ⁺ , –2.5	FIM	–	0.14				
	Li⁺-4 ($w = 1-2\%$), oNPOE ($w = 64-66\%$), KTPCIPB ($x_i = 20\%$), PVC ($w = 31-33\%$)	Na ⁺ , –2.3; K ⁺ , –2.6; Mg ²⁺ , –4.0; Ca ²⁺ , –2.7	SSM	0.1	0.1	–	–	21 ± 1 °C	[2]
	Li⁺-4 ($w = 1.2\%$), oNPOE ($w = 65.8\%$),	Na ⁺ , –2.3; K ⁺ , –2.6; NH ₄ ⁺ , –2.6; Mg ²⁺ , –2.3; Ca ²⁺ , –3.5	MPM	–	$\Delta c_B = 0.1$	57.7	–	artificial serum	[3]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	KTpCIPB ($x_i = 26\%$), PVC ($w = 33\%$)	-						background [†] ; $c_{dl} = 10^{-5.23} M$	
	Li⁺-4 ($w = 1.4\%$), oNPOE ($w = 66\%$), KTpCIPB ($x_i = 50\%$), PVC ($w = 33\%$)	Na ⁺ , -1.89; K ⁺ , -2.00; Rb ⁺ , -1.92; Cs ⁺ , -1.74; Mg ²⁺ , -2.59; Ca ²⁺ , -2.07; Sr ²⁺ , -2.10	SSM	0.1	0.1	-	-		[4]
	Li⁺-4 ($w = 1.4\%$), o-nitrophenyl pentyl ether ($w = 66\%$), KTpCIPB ($x_i = 50\%$), PVC ($w = 33\%$)	Na ⁺ , -1.96; K ⁺ , -2.37; Rb ⁺ , -2.17; Cs ⁺ , -2.24; Mg ²⁺ , <-3.70; Ca ²⁺ , -2.05; Sr ²⁺ , -2.08	MPM	-	$\Delta c_B = 0.1$			calculated from the formula: $K_{A,B} = c_A/c_B^{(1/z_B)}$	[4]
	Li⁺-4 ($w = 1.4\%$), o-nitrophenyl pentyl ether ($w = 66\%$), KTpCIPB ($x_i = 50\%$), PVC ($w = 33\%$)	Na ⁺ , -1.70; K ⁺ , -1.82; Rb ⁺ , -1.66; Cs ⁺ , -1.43; Mg ²⁺ , -1.89; Ca ²⁺ , -1.42; Sr ²⁺ , -1.14	SSM	0.1	0.1	-	-		[4]
	Li⁺-4 ($w = 1.4\%$), o-nitrophenyl pentyl ether ($w = 66\%$), KTpCIPB ($x_i = 50\%$), PVC ($w = 33\%$)	Na ⁺ , -1.70; K ⁺ , -1.89; Rb ⁺ , -1.85; Cs ⁺ , -1.80; Mg ²⁺ , -2.85; Ca ²⁺ , -1.34; Sr ²⁺ , -1.49	MPM	-	$\Delta c_B = 0.1$			calculated from the formula: $K_{A,B} = c_A/c_B^{(1/z_B)}$	[4]
Li⁺-5	Li⁺-5 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 55.6\%$), PVC ($w = 28.1\%$)	Na ⁺ , -1.8; K ⁺ , -1.7; Rb ⁺ , -1.9; Cs ⁺ , -1.9; H ⁺ , -3.2 NH ₄ ⁺ , -2.7; Mg ²⁺ , -4.9; Ca ²⁺ , -3.19; Sr ²⁺ , -3.1; Ba ²⁺ , -3.2	FIM	-	0.05	59-60	-	25 °C; r.o.o.g.	[5]
	Li⁺-5 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 55.6\%$), PVC ($w = 28.1\%$)			-	0.5				
Li⁺-6	Li⁺-6 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 57.7\%$), PVC ($w = 28.1\%$)	Na ⁺ , -2.2; K ⁺ , -1.9; Rb ⁺ , -2.2; Cs ⁺ , -2.0; H ⁺ , -3.3 NH ₄ ⁺ , -2.9; Mg ²⁺ , -5.0; Ca ²⁺ , -4.3; Sr ²⁺ , -4.1; Ba ²⁺ , -4.1	FIM	-	0.05	59-60	-	25 °C; r.o.o.g.	[5]
	Li⁺-6 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 57.7\%$), PVC ($w = 28.1\%$)			-	0.5				
Li⁺-7	Li⁺-7 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 64.0\%$), PVC ($w = 28.1\%$)	Na ⁺ , -1.9; K ⁺ , -1.7; Rb ⁺ , -2.1; Cs ⁺ , -1.9; H ⁺ , -3.2 NH ₄ ⁺ , -3.0; Mg ²⁺ , -4.4; Ca ²⁺ , -4.4; Sr ²⁺ , -4.2; Ba ²⁺ , -4.3	FIM	-	0.05	59-60	-	25 °C; r.o.o.g.	[5]
	Li⁺-7 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 64.0\%$), PVC ($w = 28.1\%$)			-	0.5				
Li⁺-8	Li⁺-8 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 80.7\%$), PVC ($w = 28.1\%$)	Na ⁺ , -2.0; K ⁺ , -1.9; Rb ⁺ , -1.6; Cs ⁺ , -1.5; H ⁺ , -2.9 NH ₄ ⁺ , -2.4; Mg ²⁺ , -4.3; Ca ²⁺ , -4.5; Sr ²⁺ , -4.2; Ba ²⁺ , -4.2	FIM	-	0.05	59-60	-	25 °C; r.o.o.g.	[5]
	Li⁺-8 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 80.7\%$), PVC ($w = 28.1\%$)			-	0.5				
Li⁺-9	Li⁺-9 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 69.0\%$), PVC ($w = 28.1\%$)	Na ⁺ , -2.2; K ⁺ , -1.9; Rb ⁺ , -2.0; Cs ⁺ , -1.8; H ⁺ , -3.4 NH ₄ ⁺ , -2.9; Mg ²⁺ , -4.5; Ca ²⁺ , -4.8; Sr ²⁺ , -4.6; Ba ²⁺ , -4.7	FIM	-	0.05	59-60	-	25 °C; r.o.o.g.	[5]
	Li⁺-9 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 69.0\%$), PVC ($w = 28.1\%$)			-	0.5				

[†] artificial serum background: NaH₂PO₄, 8 mM; Na₂HPO₄, 1.5 mM; CaCl₂, 2.0 mM; MgCl₂, 0.8 mM; KCl, 4.5 mM; NH₄Cl, 0.05 mM; glucose, 4.7 mM; urea, 2.5 mM; NaCl, 135 mM; 145 mM; and 155 mM.

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-10	Li⁺-10 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 57.4 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -2.3; K ⁺ , -2.1; Rb ⁺ , -2.1; Cs ⁺ , -1.7; H ⁺ , -3.0 NH ₄ ⁺ , -2.95; Mg ²⁺ , -4.3; Ca ²⁺ , -4.7; Sr ²⁺ , -4.4; Ba ²⁺ , -4.5	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
	Li⁺-10 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70.8 %), KTpCIPB (<i>x_i</i> = 54 %), PVC (<i>w</i> = 28.2 %)	Na ⁺ , -2.3; K ⁺ , -2.3; NH ₄ ⁺ , -2.9; Mg ²⁺ , -3.8; Ca ²⁺ , -4.5	MPM	–	$\Delta c_B = 0.1$	59.7	–	artificial serum background [†] ; <i>c_{dl}</i> = 10 ^{-5.61} M	[3]
Li⁺-11	Li⁺-11 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 64.3 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -1.95; K ⁺ , -1.7; Rb ⁺ , -2.4; Cs ⁺ , -2.1; H ⁺ , -3.7	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -3.0; Mg ²⁺ , -4.6; Ca ²⁺ , -4.65; Sr ²⁺ , -4.2; Ba ²⁺ , -4.4		–	0.5				
Li⁺-12	Li⁺-12 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 70.8 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -1.9; K ⁺ , -2.15; Rb ⁺ , -2.2; Cs ⁺ , -2.0; H ⁺ , -3.3	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -2.9; Mg ²⁺ , -4.9; Ca ²⁺ , -4.6; Sr ²⁺ , -4.4; Ba ²⁺ , -4.3		–	0.5				
Li⁺-13	Li⁺-13 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 75.5 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -2.2; K ⁺ , -2.25; Rb ⁺ , -2.2; Cs ⁺ , -1.6; H ⁺ , -3.0	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -2.7; Mg ²⁺ , -4.6; Ca ²⁺ , -3.9; Sr ²⁺ , -3.5; Ba ²⁺ , -3.55		–	0.5				
Li⁺-14	Li⁺-14 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 68.4 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -1.9; K ⁺ , -1.6; Rb ⁺ , -1.9; Cs ⁺ , -1.45; H ⁺ , -2.3	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -2.6; Mg ²⁺ , -4.7; Ca ²⁺ , -4.55; Sr ²⁺ , -4.5; Ba ²⁺ , -4.2		–	0.5				
Li⁺-15	Li⁺-15 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 82.5 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -2.3; K ⁺ , -2.5; Rb ⁺ , -2.55; Cs ⁺ , -2.45; H ⁺ , -3.2	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -3.0; Mg ²⁺ , -4.5; Ca ²⁺ , -4.0; Sr ²⁺ , -4.0; Ba ²⁺ , -3.6		–	0.5				
Li⁺-16	Li⁺-16 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 81.1 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -1.5; K ⁺ , -1.7; Rb ⁺ , -2.2; Cs ⁺ , -1.1	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
		NH ₄ ⁺ , -1.8; Mg ²⁺ , -3.1; Ca ²⁺ , -3.5; Sr ²⁺ , -2.9; Ba ²⁺ , -2.95		–	0.5				
Li⁺-17	Li⁺-17 (<i>w</i> = 1.0 %), oNPOE (<i>w</i> = 70.2 %),	Na ⁺ , -2.05; K ⁺ , -2.0; Rb ⁺ , -1.9; Cs ⁺ , -1.4; H ⁺ , -2.5	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]

[†] artificial serum background: NaH₂PO₄, 8 mM; Na₂HPO₄, 1.5 mM; CaCl₂, 2.0 mM; MgCl₂, 0.8 mM; KCl, 4.5 mM; NH₄Cl, 0.05 mM; glucose, 4.7 mM; urea, 2.5 mM; NaCl, 135 mM; 145 mM; and 155 mM.

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	KTpCIPB ($x_i = 66.3\%$), PVC ($w = 28.1\%$)	NH ₄ ⁺ , -3.0; Mg ²⁺ , -4.7; Ca ²⁺ , -4.65; Sr ²⁺ , -4.4; Ba ²⁺ , -4.35		–	0.5				
Li⁺-18	Li⁺-18 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 72.5\%$), PVC ($w = 28.1\%$)	Na ⁺ , -2.35; K ⁺ , -2.5; Rb ⁺ , -2.8; Cs ⁺ , -2.4; H ⁺ , -0.5	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
	KTpCIPB ($x_i = 72.5\%$), PVC ($w = 28.1\%$)	NH ₄ ⁺ , -3.0; Mg ²⁺ , -4.6; Ca ²⁺ , -3.55; Sr ²⁺ , -3.9; Ba ²⁺ , -3.2		–	0.5				
Li⁺-19	Li⁺-19 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 72.9\%$), PVC ($w = 28.1\%$)	Na ⁺ , -1.7; K ⁺ , -2.0; Rb ⁺ , -2.2; Cs ⁺ , -1.5; H ⁺ , -3.4	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
	KTpCIPB ($x_i = 72.9\%$), PVC ($w = 28.1\%$)	NH ₄ ⁺ , -2.95; Mg ²⁺ , -4.65; Ca ²⁺ , -4.4; Sr ²⁺ , -4.5; Ba ²⁺ , -4.55		–	0.5				
Li⁺-20	Li⁺-20 ($w = 1.0\%$), oNPOE ($w = 70.2\%$), KTpCIPB ($x_i = 116\%$), PVC ($w = 28.1\%$)	Na ⁺ , -0.8; K ⁺ , -0.5; Rb ⁺ , -1.2; Cs ⁺ , -0.9; H ⁺ , -2.8	FIM	–	0.05	59–60	–	25 °C; r.o.o.g.	[5]
	KTpCIPB ($x_i = 116\%$), PVC ($w = 28.1\%$)	NH ₄ ⁺ , -2.4; Mg ²⁺ , -4.4; Ca ²⁺ , -4.2; Sr ²⁺ , -4.3; Ba ²⁺ , -4.1		–	0.5				
Li⁺-21	Li⁺-21 ($w = 3\%$), DBE ($w = 66\%$), KTpCIPB ($x_i = 46\%$), PVC ($w = 30\%$)	Na ⁺ , -1.05; K ⁺ , -1.9; Rb ⁺ , -2.6; Cs ⁺ , -2.2; Mg ²⁺ , -4.7; Ca ²⁺ , -4.4; Sr ²⁺ , -4.4; Ba ²⁺ , -4.3	FIM	–	0.1	60	–	25 °C; r.o.o.g.	[6]
	Li ⁺ -21 ($w = 3\%$), DBE ($w = 70\%$), KTpCIPB ($x_i = 46\%$), PVC ($w = 26\%$)	Na ⁺ , -0.88; K ⁺ , -1.6; Cs ⁺ , -2.4; Rb ⁺ , -2.4; Mg ²⁺ , -5.0; Ca ²⁺ , -4.8; Sr ²⁺ , -4.8; Ba ²⁺ , -5.1	SSM	0.1	0.1	–	–		[7]
Li⁺-22	Li⁺-22 ($w = 3\%$), DBE ($w = 66\%$), KTpCIPB ($x_i = 49\%$), PVC ($w = 30\%$)	Na ⁺ , -1.5; K ⁺ , -2.5; Rb ⁺ , -2.7; Cs ⁺ , -2.0; Mg ²⁺ , -4.7; Ca ²⁺ , -4.7; Sr ²⁺ , -4.7; Ba ²⁺ , -4.6	FIM	–	0.1	60	–	25 °C; r.o.o.g.	[6]
	Li ⁺ -22 ($w = 3\%$), DBE ($w = 70\%$), KTpCIPB ($x_i = 49\%$), PVC ($w = 26\%$)	Na ⁺ , -1.6; K ⁺ , -2.6; Rb ⁺ , -2.7; Cs ⁺ , -2.8; Mg ²⁺ , -5.0; Ca ²⁺ , -4.9; Sr ²⁺ , -4.9; Ba ²⁺ , -4.9	SSM	0.1	0.1	–	–		[7]
Li⁺-23	Li⁺-23 ($w = 3\%$), DBE ($w = 66\%$), KTpCIPB ($x_i = 50.4\%$), PVC ($w = 30\%$)	Na ⁺ , -1.2; K ⁺ , -1.7; Rb ⁺ , -1.7; Cs ⁺ , -1.6; Mg ²⁺ , -1.5; Ca ²⁺ , +0.1; Sr ²⁺ , -0.6; Ba ²⁺ , -0.5	FIM	–	0.1	60	–	25 °C; r.o.o.g.	[6]
Li⁺-24	Li⁺-24 ($w = 3\%$), DBE ($w = 66\%$), KTpCIPB ($x_i = 51\%$), PVC ($w = 30\%$)	Na ⁺ , -1.3; K ⁺ , -1.9; Rb ⁺ , -2.0; Cs ⁺ , -1.9; Mg ²⁺ , -2.9; Ca ²⁺ , -2.0; Sr ²⁺ , -2.7; Ba ²⁺ , -2.7	FIM	–	0.1	60	–	25 °C; r.o.o.g.	[6]
Li⁺-25	Li⁺-25 ($w = 1.5\%$), KTpCIPB ($x_i = 52.9\%$),	Na ⁺ , -0.96; K ⁺ , -0.89	MPM	–	$\Delta c_{Na} = 0.1$	59	–	14 mM NaCl background	[8]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	lgK _{Li⁺,Bⁿ⁺}	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	oNPOE (<i>w</i> = 64.7 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -0.80	FIM	–	0.014	–	–		
		Na ⁺ , -1.05; K ⁺ , -0.89	SSM	–	–	–	–	14 mM NaCl background	
		Na ⁺ , -0.60; K ⁺ , -0.80	MPM	–	Δ <i>c</i> _{Na} = 0.1	58	–	2.4 mM MgCl ₂ background	
		Na ⁺ , -0.60			Δ <i>c</i> _{Na} = 0.05				
		Na ⁺ , -1.0; K ⁺ , -1.09	MPM	–	Δ <i>c</i> _{Na} = 0.1	55	–	5.5 mM KCl background	
		Na ⁺ , -1.0			Δ <i>c</i> _{Na} = 0.05				
		K ⁺ , -0.85	FIM	–	0.0055	–	–		
		K ⁺ , -0.82	FIM	–	0.0055	–	–		
				(18 mV [†])					
		Na ⁺ , -1.0	MPM	–	Δ <i>c</i> _{Na} = 0.13	58	–	10 mM NaCl background	
		Na ⁺ , -1.03; K ⁺ , -1.0			Δ <i>c</i> _{Na} = 0.06				
		Na ⁺ , -1.0			Δ <i>c</i> _{Na} = 0.01				
		Na ⁺ , -1.0	FIM	–	0.01	–	–		
		Na ⁺ , -1.0	FIM	–	0.01	–	–		
				(18 mV [†])					
		Na ⁺ , -1.03; K ⁺ , -1.10	MPM	–	Δ <i>c</i> _{Na} = 0.12	54	–	20 mM NaCl background	
		Na ⁺ , -1.08			Δ <i>c</i> _{Na} = 0.05				
		Na ⁺ , -1.03	FIM	–	0.02	–	–		
		Na ⁺ , -1.07	FIM	–	0.02	–	–		
				(18 mV [†])	–				
	Na ⁺ , -1.10; K ⁺ , -1.26	MPM	–	Δ <i>c</i> _{Na} = 0.08	48	–	70 mM NaCl background		
	Na ⁺ , -1.11			Δ <i>c</i> _{Na} = 0.07					
	Na ⁺ , -1.10	FIM	–	0.07	–	–			
	Na ⁺ , -1.19	FIM	–	0.07	–	–			
			(18 mV [†])						
	Na ⁺ , -1.22; K ⁺ , -1.96	MPM	–	Δ <i>c</i> _{Na} = 0.1	46	–	140 mM NaCl background		
	Na ⁺ , -1.82			Δ <i>c</i> _{Na} = 0.01					
	Na ⁺ , -1.48	FIM	–	0.14	–	–			
	Na ⁺ , -1.80	FIM	–	0.14	–	–			
			(18 mV [†])						
Li⁺-26	Li⁺-26 (<i>w</i> = 1.5 %), KTpCIPB (<i>x</i> _i = 70.3 %),	Na ⁺ , -0.74	SSM	0.1	0.1	–	–		[8]
		Na ⁺ , -0.79		0.05	0.05				

† M. Yamauchi, A. Jyo, N. Ishibashi, Anal. Chim. Acta, 136 (1982) 399.

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.	
oNPOE (<i>w</i> = 64.7 %), PVC (<i>w</i> = 32.8 %)		Na ⁺ , -0.72; K ⁺ , -0.74	MPM	–	$\Delta c_{Na} = 0.1$	60	–	14 mM NaCl	[4]	
		Na ⁺ , -0.72			$\Delta c_{Na} = 0.05$			background		
		Na ⁺ , -0.60	FIM	–		0.014		–		
		Na ⁺ , -0.52; K ⁺ , -0.72	MPM	–		$\Delta c_{Na} = 0.1$	53	–		2.4 mM MgCl ₂
		Na ⁺ , -0.54				$\Delta c_{Na} = 0.05$				background
		Na ⁺ , -0.82; K ⁺ , -0.70	MPM	–		$\Delta c_{Na} = 0.1$	62	–		5.5 mM KCl
		Na ⁺ , -0.82				$\Delta c_{Na} = 0.05$				background
		K ⁺ , -0.39	FIM	–		0.0055	–	–		
		K ⁺ , -0.35	FIM	–		0.0055	–	–		
					(18 mV [†])					
		Na ⁺ , -0.82; K ⁺ , -0.82	MPM	–		$\Delta c_{Na} = 0.13$	61	–		10 mM NaCl
		Na ⁺ , -0.85				$\Delta c_{Na} = 0.06$				background
		Na ⁺ , -0.92				$\Delta c_{Na} = 0.01$				10 mM NaCl
		Na ⁺ , -0.80	FIM	–		0.01		–		background
		Na ⁺ , -0.80	FIM	–		0.01		–		
					(18 mV [†])					
		Na ⁺ , -0.85; K ⁺ , -0.52	MPM	–		$\Delta c_{Na} = 0.12$	60	–		20 mM NaCl
		Na ⁺ , -0.89				$\Delta c_{Na} = 0.05$				background
		Na ⁺ , -0.89	FIM	–		0.02		–		
		Na ⁺ , -1.0	FIM	–		0.02		–		
			(18 mV [†])							
Na ⁺ , -0.62; K ⁺ , -0.60	MPM	–		$\Delta c_{Na} = 0.07$	53	–	70 mM NaCl			
Na ⁺ , -0.82				$\Delta c_{Na} = 0.03$			background			
Na ⁺ , -1.01	FIM	–		0.07		–				
Na ⁺ , -1.10	FIM	–		0.07		–				
			(18 mV [†])							
Na ⁺ , -1.03; K ⁺ , -0.96	MPM	–		$\Delta c_{Na} = 0.1$	53	–	140 mM NaCl			
Na ⁺ , -1.3				$\Delta c_{Na} = 0.01$			background			
Na ⁺ , -1.12	FIM	–		0.14		–				
Na ⁺ , -1.14	FIM	–		0.14		–				
			(18 mV [†])							
Li⁺-26 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 66 %), KTPClPB (<i>x_i</i> = 50 %),		Na ⁺ , -1.64; K ⁺ , -1.85; Rb ⁺ , -1.89; Cs ⁺ , -1.79; Mg ²⁺ , -3.34; Ca ²⁺ , -2.30; Sr ²⁺ , -2.60	SSM	0.1	0.1	–	–			

† M. Yamauchi, A. Jyo, N. Ishibashi, *Anal. Chim. Acta*, 136 (1982) 399.

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	PVC (<i>w</i> = 33 %)	Na ⁺ , -1.54; K ⁺ , -1.77; Rb ⁺ , -1.89; Cs ⁺ , -1.72; Mg ²⁺ , -3.49; Ca ²⁺ , -2.21; Sr ²⁺ , -2.55	MPM	–	$\Delta c_B = 0.1$	–	–	calculated from the formula: $K_{A,B} = c_A/c_B^{(1/z_B)}$	
	Li⁺-26 (<i>w</i> = 1.4 %), <i>o</i> -nitrophenyl pentyl ether (<i>w</i> = 66 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.70; K ⁺ , -1.89; Rb ⁺ , -1.70; Cs ⁺ , -1.48; Mg ²⁺ , -3.48; Ca ²⁺ , -2.00; Sr ²⁺ , -2.52	SSM	0.1	0.1	–	–		[4]
		Na ⁺ , -1.55; K ⁺ , -1.78; Rb ⁺ , -2.00; Cs ⁺ , -1.35; Mg ²⁺ , <-3.70 Ca ²⁺ , -1.85; Sr ²⁺ , -2.44	–	–	$\Delta c_B = 0.1$	–	–	calculated from the formula: $K_{A,B} = c_A/c_B^{(1/z_B)}$	
Li⁺-27	Li⁺-27 (<i>w</i> = 1.5 %), KTpCIPB (<i>x_i</i> = 35 %), <i>o</i> NPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.96 K ⁺ , -2.17; Mg ²⁺ , -2.85; Ca ²⁺ , -2.28 H ⁺ , -3.40	MPM	–	$\Delta c_{Na} = 0.02$ or 0.11 $\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ $\Delta c_H = 0.1$	–	–	140 mM NaCl background 100 mM HCl background	[9]
		Na ⁺ , -2.00 H ⁺ , -3.40	FIM	–	0.14 0.1	–	–		
	Li⁺-27 (<i>w</i> = 1.5 %), KTpCIPB (<i>x_i</i> = 35 %), <i>o</i> NPOE (<i>w</i> = 64 %), TOPO (<i>w</i> = 1 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.20 K ⁺ , -2.85; Mg ²⁺ , -2.89 Ca ²⁺ , -2.57 H ⁺ , -3.40	MPM	–	$\Delta c_{Na} = 0.02$ or 0.11 $\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ $\Delta c_H = 0.1$	–	–	140 mM NaCl background 100 mM HCl background	[9]
		Na ⁺ , -2.15 H ⁺ , -3.40	FIM	–	0.14 0.1	–	–		
Li⁺-28	Li⁺-28 (<i>w</i> = 1.5 %), KTpCIPB (<i>x_i</i> = 34 %), <i>o</i> NPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.92 K ⁺ , -1.60; Mg ²⁺ , -0.80 Ca ²⁺ , -0.80	MPM	–	$\Delta c_{Na} = 0.02$ or 0.11 $\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$	–	–	140 mM NaCl background	[9]
		Na ⁺ , -0.74	FIM	–	0.14	–	–		
	Li⁺-28 (<i>w</i> = 1.5 %), KTpCIPB (<i>x_i</i> = 34 %), TOPO (<i>w</i> = 1 %), <i>o</i> NPOE (<i>w</i> = 64 %),	Na ⁺ , -1.08; Mg ²⁺ , -0.74	MPM	–	$\Delta c_{Na} = 0.02$ or 0.11 $\Delta c_{Mg} = 0.1$	–	–	140 mM NaCl background	[9]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-29	PVC (<i>w</i> = 33 %)	Ca ²⁺ , -0.24 Na ⁺ , -0.85	FIM	-		$\Delta c_{Ca} = 0.0025$ 0.14	-		
	Li⁺-29 (<i>w</i> = 1.5 %), KTPCIPB (<i>x_i</i> = 23 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.96	MPM	-		$\Delta c_{Na} = 0.02$ or 0.11	-	140 mM NaCl	[9]
		K ⁺ , -1.85; Mg ²⁺ , -0.42; Ca ²⁺ , 0 Na ⁺ , -1.40	FIM	-		$\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ 0.14	-		
	Li⁺-29 (<i>w</i> = 1.5 %), KTPCIPB (<i>x_i</i> = 23 %), TOPO (<i>w</i> = 1 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.38	MPM	-		$\Delta c_{Na} = 0.02$ or 0.11	-	140 mM NaCl	[9]
		K ⁺ , +0.50; Mg ²⁺ , -1.96 Ca ²⁺ , -2.19 H ⁺ , -3.40				$\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ $\Delta c_H = 0.1$		100 mM HCl	
		Na ⁺ , -1.15 H ⁺ , -3.40	FIM	-		0.14 0.1	-		
Na ⁺ , -0.77		MPM	-		$\Delta c_{Na} = 0.02$ or 0.01	-	140 mM NaCl	[9]	
Li⁺-30	Li⁺-30 (<i>w</i> = 1.5 %), KTPCIPB (<i>x_i</i> = 22 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	K ⁺ , -0.54; Mg ²⁺ , -1.28 Ca ²⁺ , -1.06 Na ⁺ , -0.77	FIM	-		$\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ 0.14	-		
		Na ⁺ , -1.70	MPM	-		$\Delta c_{Na} = 0.02$ or 0.01	-	140 mM NaCl	[9]
	Li⁺-30 (<i>w</i> = 1.5 %), KTPCIPB (<i>x_i</i> = 22 %), oNPOE (<i>w</i> = 64 %), PVC (<i>w</i> = 33 %), TOPO (<i>w</i> = 1 %)	K ⁺ , -2.28; Mg ²⁺ , -0.31 Ca ²⁺ , +0.20 Na ⁺ , -1.92	FIM	-		$\Delta c_{K, Mg} = 0.1$ $\Delta c_{Ca} = 0.0025$ 0.14	-		
		Na ⁺ , -2.0; K ⁺ , -2.3; Mg ²⁺ , -2.7; Ca ²⁺ , -1.3	SSM	0.1	0.1	-	-	21 ± 1 °C	[2]
Li⁺-31	Li⁺-31 (<i>w</i> = 1–2 %), oNPOE (<i>w</i> = 64–66 %), KTPCIPB (<i>x_i</i> = 20 %), PVC (<i>w</i> = 31–33 %)	Na ⁺ , -1.9; K ⁺ , -2.1; Mg ²⁺ , -2.8; Ca ²⁺ , -0.8	SSM	0.1	0.1	-	-	21 ± 1 °C	[2]
Li⁺-32	Li⁺-32 (<i>w</i> = 1–2 %), oNPOE (<i>w</i> = 64–66 %), KTPCIPB (<i>x_i</i> = 20 %), PVC (<i>w</i> = 31–33 %)	Na ⁺ , -2.0; K ⁺ , -2.2; Mg ²⁺ , -2.8; Ca ²⁺ , -1.4	SSM	0.1	0.1	-	-	21 ± 1 °C	[2]
Li⁺-33	Li⁺-33 (<i>w</i> = 1–2 %), oNPOE (<i>w</i> = 64–66 %), KTPCIPB (<i>x_i</i> = 20 %),								

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-34	PVC (w = 31–33 %) Li⁺-34 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 50 %), PVC (w = 26 %)	Na ⁺ , +0.24; K ⁺ , –0.32; Rb ⁺ , –1.3; Cs ⁺ , –2.2; Mg ²⁺ , –2.7; Ca ²⁺ , –1.4; Sr ²⁺ , –0.76; Ba ²⁺ , +1.1	SSM	0.1	0.1	–	–	pH = 7.0; 25 °C	[7]
	Li⁺-34 (w = 3 %), DBE (w = 66 %), KTPCIPB (x _i = 50 %), PVC (w = 30 %)	Na ⁺ , +0.3; K ⁺ , –0.06; Rb ⁺ , –0.6; Cs ⁺ , –1.2; Mg ²⁺ , –2.4; Ca ²⁺ , –1.4; Sr ²⁺ , –0.5; Ba ²⁺ , +1.2	FIM	–	0.1	60	–	25 °C; r.o.o.g.	[6]
Li⁺-35	Li⁺-35 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 51 %), PVC (w = 26 %)	Na ⁺ , +0.72; K ⁺ , –0.16; Rb ⁺ , –0.68; Cs ⁺ , –2.2; Mg ²⁺ , –3.4; Ca ²⁺ , –3.1; Sr ²⁺ , –2.8; Ba ²⁺ , –2.4	SSM	0.1	0.1	–	–		[7]
Li⁺-36	Li⁺-36 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 62 %), PVC (w = 26 %)	Na ⁺ , +0.60; K ⁺ , –0.60; Rb ⁺ , –1.2; Cs ⁺ , –1.9; Mg ²⁺ , –3.4; Ca ²⁺ , –3.0; Sr ²⁺ , –2.8; Ba ²⁺ , –2.4	SSM	0.1	0.1	–	–		[7]
Li⁺-37	Li⁺-37 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 54 %), PVC (w = 26 %)	Na ⁺ , +0.10; K ⁺ , –0.20; Rb ⁺ , –0.74; Cs ⁺ , –2.1; Mg ²⁺ , –3.7; Ca ²⁺ , –3.6; Sr ²⁺ , –3.5; Ba ²⁺ , –3.2	SSM	0.1	0.1	–	–		[7]
Li⁺-38	Li⁺-38 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 57 %), PVC (w = 26 %)	Na ⁺ , +0.84; K ⁺ , +1.4; Rb ⁺ , +1.3; Cs ⁺ , –0.48; Mg ²⁺ , –1.6; Ca ²⁺ , –1.4; Sr ²⁺ , –1.5; Ba ²⁺ , –0.96	SSM	0.1	0.1	–	–		[7]
Li⁺-39	Li⁺-39 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 57 %), PVC (w = 26 %)	Na ⁺ , –0.64; K ⁺ , –1.4; Rb ⁺ , –1.8; Cs ⁺ , –2.6; Mg ²⁺ , –4.9; Ca ²⁺ , –4.3; Sr ²⁺ , –4.2; Ba ²⁺ , –4.0	SSM	0.1	0.1	–	–		[7]
Li⁺-40	Li⁺-40 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 60 %), PVC (w = 26 %)	Na ⁺ , +0.56; K ⁺ , +0.32; Rb ⁺ , +0.36; Cs ⁺ , +0.38; Mg ²⁺ , –1.9; Ca ²⁺ , –1.8; Sr ²⁺ , –2.0; Ba ²⁺ , –2.0	SSM	0.1	0.1	–	–		[7]
Li⁺-41	Li⁺-41 (w = 3 %), DBE (w = 70 %), KTPCIPB (x _i = 55 %), PVC (w = 26 %)	Na ⁺ , +0.12; K ⁺ , +0.52; Rb ⁺ , +0.56; Cs ⁺ , +0.64; Mg ²⁺ , –2.4; Ca ²⁺ , –2.4; Sr ²⁺ , –2.4; Ba ²⁺ , –1.9	SSM	0.1	0.1	–	–		[7]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li ⁺ -42	Li ⁺ -42 (<i>w</i> = 3 %), DBE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 53 %), PVC (<i>w</i> = 26 %)	Na ⁺ , -1.6; K ⁺ , -2.6; Rb ⁺ , -2.6; Cs ⁺ , -2.6; Mg ²⁺ , -4.6; Ca ²⁺ , -4.4; Sr ²⁺ , -4.3; Ba ²⁺ , -4.2	SSM	0.1	0.1	-	-		[7]
Li ⁺ -43	Li ⁺ -43 (<i>w</i> = 3 %), DBE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 54 %), PVC (<i>w</i> = 26 %)	Na ⁺ , -1.6; K ⁺ , -2.7; Rb ⁺ , -2.7; Cs ⁺ , -2.7; Mg ²⁺ , -4.8; Ca ²⁺ , -4.5; Sr ²⁺ , -4.4; Ba ²⁺ , -4.2	SSM	0.1	0.1	-	-		[7]
Li ⁺ -44	Li ⁺ -44 (<i>w</i> = 3 %), DBE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 54 %), PVC (<i>w</i> = 26 %)	Na ⁺ , -1.8; K ⁺ , -2.6; Rb ⁺ , -3.1; Cs ⁺ , -3.3; Mg ²⁺ , -4.9; Ca ²⁺ , -4.5; Sr ²⁺ , -4.5; Ba ²⁺ , -4.5	SSM	0.1	0.1	59	10 ⁻⁵ -10 ⁻¹	25 °C	[7]
Li ⁺ -45	Li ⁺ -45 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.38; K ⁺ , -2.23; Rb ⁺ , -2.29; Cs ⁺ , -1.73; NH ₄ ⁺ , -3.65; H ⁺ , -2.98; Mg ²⁺ , -4.58	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]
Li ⁺ -46	Li ⁺ -46 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.38; K ⁺ , -1.40; Rb ⁺ , -1.94; Cs ⁺ , -1.59; NH ₄ ⁺ , -3.42; H ⁺ , -3.52; Mg ²⁺ , -4.53; Ca ²⁺ , -4.21; Sr ²⁺ , -3.97; Ba ²⁺ , -3.91	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]
Li ⁺ -47	Li ⁺ -47 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.35; K ⁺ , -1.37; Rb ⁺ , -1.52; Cs ⁺ , -1.00; NH ₄ ⁺ , -3.09; H ⁺ , -2.86; Mg ²⁺ , -3.85; Ca ²⁺ , -3.98; Sr ²⁺ , -4.05; Ba ²⁺ , -3.93	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]
Li ⁺ -48	Li ⁺ -48 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.28; K ⁺ , -1.45; Rb ⁺ , -2.15; Cs ⁺ , -1.90; NH ₄ ⁺ , -3.45; H ⁺ , -3.09; Mg ²⁺ , -4.52; Ca ²⁺ , -3.78; Sr ²⁺ , -3.51; Ba ²⁺ , -3.66	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]
Li ⁺ -49	Li ⁺ -49 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.36; K ⁺ , -1.68; Rb ⁺ , -1.97; Cs ⁺ , -1.63; NH ₄ ⁺ , -3.31; H ⁺ , -2.89; Mg ²⁺ , -4.52; Ca ²⁺ , -3.92; Sr ²⁺ , -3.95; Ba ²⁺ , -4.00	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]
Li ⁺ -50	Li ⁺ -50 (<i>w</i> = 1 %), oNPOE (<i>w</i> = 70 %), KTpCIPB (<i>x_i</i> = 50 %), PVC (<i>w</i> = 28 %)	Na ⁺ , -2.34; K ⁺ , -1.43; Rb ⁺ , -1.79; Cs ⁺ , -1.34; NH ₄ ⁺ , -2.96; H ⁺ , -2.01; Mg ²⁺ , -4.44; Ca ²⁺ , -3.81; Sr ²⁺ , -3.65; Ba ²⁺ , -3.54	FIM	-	0.5 H ⁺ , 0.05	59	-	25 °C	[10]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li ⁺ -51	Li ⁺ -51 (<i>w</i> = 4 %), PVC (<i>w</i> = 32.2 %), KTpCIPB (<i>x</i> _i = 12 %), oNPOE (<i>w</i> = 63.4 %)	Na ⁺ , -0.60; K ⁺ , -0.40; NH ₄ ⁺ , -1.00; Ca ²⁺ , +0.60; Ba ²⁺ , +0.30	MPM	–	–	53.0	–	140 mM Na ⁺ background	[11]
	Li ⁺ -51 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 12 %), oNPOE (<i>w</i> = 62.7 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.60; K ⁺ , -0.56; NH ₄ ⁺ , -0.38; Ca ²⁺ , -0.17; Ba ²⁺ , -0.30	SSM	–	–	–	–		[11]
	Li ⁺ -51 (<i>w</i> = 4 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.72; K ⁺ , -0.60; NH ₄ ⁺ , -0.08; Ca ²⁺ , +0.40; Ba ²⁺ , +0.40	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -51 (<i>w</i> = 4 %), PVC (<i>w</i> = 32.2 %), KTpCIPB (<i>x</i> _i = 12 %), oNPPE (<i>w</i> = 63.4 %)	Na ⁺ , -1.40; K ⁺ , -0.82; NH ₄ ⁺ , -0.70; Ca ²⁺ , +1.00; Ba ²⁺ , +0.70	MPM	–	–	55.0	–	140 mM Na ⁺ background	[11]
	Li ⁺ -51 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %), oNPPE (<i>w</i> = 62.7 %)	Na ⁺ , -0.32; K ⁺ , -0.20; NH ₄ ⁺ , +0.15; Ca ²⁺ , +0.75; Ba ²⁺ , +0.45	SSM	–	–	–	–		[11]
	Li ⁺ -51 (<i>w</i> = 4 %), nitrophenyl butyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.48; K ⁺ , -1.00; NH ₄ ⁺ , -1.00; Ca ²⁺ , +0.90; Ba ²⁺ , +0.60	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -51 (<i>w</i> = 4 %), nitrophenyl butyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -0.70; K ⁺ , -0.04; NH ₄ ⁺ , +0.60; Ca ²⁺ , +1.60; Ba ²⁺ , -0.15	MPM	–	–	48.0	–	140 mM Na ⁺ background	[11]
	Li ⁺ -51 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %), nitrophenyl butyl ether (<i>w</i> = 62.7 %)	NH ₄ ⁺ , -0.58; Ca ²⁺ , +0.11; Ba ²⁺ , -0.40	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -51 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -0.77; K ⁺ , -0.22; NH ₄ ⁺ , +0.52; Ca ²⁺ , +1.60; Ba ²⁺ , -0.30	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -51 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.00; K ⁺ , +0.30; NH ₄ ⁺ , +1.00; Ca ²⁺ , +1.90; Ba ²⁺ , +1.40	MPM	–	–	49.1	–	140 mM Na ⁺ background	[11]
	Li ⁺ -51 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 62.7 %), KTpCIPB (<i>x</i> _i = 12 %), PVC (<i>w</i> = 31.4 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.80; K ⁺ , -0.60; NH ₄ ⁺ , -0.04; Ca ²⁺ , +0.56; Ba ²⁺ , +0.15	SSM	–	–	–	–		[11]
	Na ⁺ , -1.10; K ⁺ , +0.08; NH ₄ ⁺ , +0.70; Ca ²⁺ , +2.00; Ba ²⁺ , +1.32	MPM	–	–	–	–	140 mM Na ⁺ background		

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^n+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-52	Li ⁺ -52 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 13 %), oNPOE (<i>w</i> = 63.4 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.30; K ⁺ , -0.60; NH ₄ ⁺ , -0.52; Ca ²⁺ , -1.10; Ba ²⁺ , -1.52	MPM	–	–	51.3	–	140 mM Na ⁺ background	[11]
		Na ⁺ , -1.23	FIM	–	–	–	–		
		Na ⁺ , -1.34	FIM (18 mV)	–	–	–	–		
	Li ⁺ -52 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 13 %), oNPOE (<i>w</i> = 62.7 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.96; K ⁺ , -0.85; NH ₄ ⁺ , -0.80; Ca ²⁺ , -1.43; Ba ²⁺ , -1.52	SSM	–	–	–	–		[11]
		Na ⁺ , -1.35; K ⁺ , -0.77; NH ₄ ⁺ , -0.60; Ca ²⁺ , -1.22; Ba ²⁺ , -1.70	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -52 (<i>w</i> = 4 %), PVC (<i>w</i> = 32.2 %), KTpCIPB (<i>x</i> _i = 13 %), oNPPE (<i>w</i> = 63.4 %)	Na ⁺ , -1.74; K ⁺ , -0.92; NH ₄ ⁺ , -0.60; Ca ²⁺ , -1.08; Ba ²⁺ , -1.60	MPM	–	–	51.0	–	140 mM Na ⁺ background	[11]
		Na ⁺ , -1.00; K ⁺ , -0.80; NH ₄ ⁺ , -0.70; Ca ²⁺ , -1.36; Ba ²⁺ , -1.41	SSM	–	–	30.0	–		[11]
	Li ⁺ -52 (<i>w</i> = 4 %), KTpCIPB (<i>x</i> _i = 13 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %), ONPPE (<i>w</i> = 62.7 %)	Na ⁺ , -1.92; K ⁺ , -0.77; NH ₄ ⁺ , -0.30; Ca ²⁺ , -1.60; Ba ²⁺ , -2.00	MPM	–	–	26.0	–	140 mM Na ⁺ background	
		Na ⁺ , -1.52; K ⁺ , -0.70; NH ₄ ⁺ , -0.40; Ca ²⁺ , -1.40; Ba ²⁺ , -1.52	MPM	–	–	50.6	–	140 mM Na ⁺ background	[11]
	Li ⁺ -52 (<i>w</i> = 4 %), nitrophenyl butyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 13 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -0.85; K ⁺ , -0.70; NH ₄ ⁺ , -0.62; Ca ²⁺ , -1.30; Ba ²⁺ , -1.38	SSM	–	–	–	–		[11]
		Na ⁺ , -1.48; K ⁺ , -0.60; NH ₄ ⁺ , -0.30; Ca ²⁺ , -1.30; Ba ²⁺ , -1.40	MPM	–	–	–	–	140 mM Na ⁺ background	
	Li ⁺ -52 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 13 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.00; K ⁺ , -0.70; NH ₄ ⁺ , -0.22; Ca ²⁺ , -0.70; Ba ²⁺ , -1.04	MPM	–	–	53.3	–	140 mM Na ⁺ background	[11]
		Na ⁺ , -0.77; K ⁺ , -0.47; NH ₄ ⁺ , -0.11; Ca ²⁺ , -1.22; Ba ²⁺ , -1.30	SSM	–	–	–	–		[11]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^n+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -1.04; K ⁺ , -0.77; NH ₄ ⁺ , -0.30; Ca ²⁺ , -0.77; Ba ²⁺ , -1.08	MPM	–	–	–	–	140 mM Na ⁺ background	
Li⁺-53	Li⁺-53 (<i>w</i> = 4 %), KTPCIPB (<i>x</i> ₁ = 17 %), oNPOE (<i>w</i> = 63.4 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.60; K ⁺ , -1.08; NH ₄ ⁺ , -0.35; Ca ²⁺ , -0.30; Ba ²⁺ , -1.30	MPM	–	–	54.0	–	140 mM Na ⁺ background	[11]
		Na ⁺ , -1.04	SSM	–	–	–	–		
		Na ⁺ , -1.23	FIM	–	–	–	–		
		Na ⁺ , -1.34	FIM	–	–	–	–		
			(18 mV)						
	Li⁺-53 (<i>w</i> = 4 %), KTPCIPB (<i>x</i> ₁ = 17 %), PVC (<i>w</i> = 31.8 %), oNPOE (<i>w</i> = 62.7 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -1.37; K ⁺ , -1.22; NH ₄ ⁺ , -0.62; Ca ²⁺ , +0.62; Ba ²⁺ , -1.52	SSM	–	–	31.0	–		[11]
		Na ⁺ , -1.70; K ⁺ , -1.35; NH ₄ ⁺ , -0.15; Ca ²⁺ , +0.90; Ba ²⁺ , -0.49	MPM	–	–	33.3	–	140 mM Na ⁺ background	
		Na ⁺ , -1.23	FIM	–	–	–	–		
		Na ⁺ , -1.34	FIM	–	–	–	–		
			(18 mV)						
	Li⁺-53 (<i>w</i> = 4 %), KTPCIPB (<i>x</i> ₁ = 17 %), PVC (<i>w</i> = 32.2 %), oNPPE (<i>w</i> = 63.4 %)	Na ⁺ , -1.04; K ⁺ , -0.70; NH ₄ ⁺ , +0.30; Ca ²⁺ , +1.78; Ba ²⁺ , -0.40	MPM	–	–	49.5	–	140 mM Na ⁺ background	[11]
		Na ⁺ , -0.92	SSM	–	–	–	–		
		Na ⁺ , -1.08	FIM	–	–	–	–		
		Na ⁺ , -1.26	FIM	–	–	–	–		
			(18 mV)						
	Li⁺-53 (<i>w</i> = 4 %), KTPCIPB (<i>x</i> ₁ = 17 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %), oNPPE (<i>w</i> = 62.7 %)	Na ⁺ , -0.82; K ⁺ , -0.51; NH ₄ ⁺ , -0.25; Ca ²⁺ , +1.20; Ba ²⁺ , -1.09	SSM	–	–	–	–		[11]
		Na ⁺ , -1.42; K ⁺ , -0.74; NH ₄ ⁺ , +0.23; Ca ²⁺ , +1.73; Ba ²⁺ , -0.54	MPM	–	–	–	–	140 mM Na ⁺ background	
		Na ⁺ , -1.23	FIM	–	–	–	–		
		Na ⁺ , -1.52	FIM	–	–	–	–		
			(18 mV)						
	Li⁺-53 (<i>w</i> = 4 %), nitrophenyl butyl ether (<i>w</i> = 63.4 %), KTPCIPB (<i>x</i> ₁ = 17 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.15; K ⁺ , -1.00; NH ₄ ⁺ , +0.04; Ca ²⁺ , +1.30; Ba ²⁺ , -0.30	MPM	–	–	49.8	–	140 mM Na ⁺ background	[11]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^n+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	Li⁺-53 (<i>w</i> = 4 %), nitrophenyl butyl ether (<i>w</i> = 62.7 %), KTpCIPB (<i>x</i> _i = 17 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.80; K ⁺ , -0.74; NH ₄ ⁺ , -0.66; Ca ²⁺ , +0.81; Ba ²⁺ , -1.15	SSM	-	-	-	-		[11]
		Na ⁺ , -1.22; K ⁺ , -1.10; NH ₄ ⁺ , +0.08; Ca ²⁺ , +1.26; Ba ²⁺ , -0.40	MPM	-	-	-	-	140 mM Na ⁺ background	
	Li⁺-53 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 63.4 %), KTpCIPB (<i>x</i> _i = 17 %), PVC (<i>w</i> = 32.2 %)	Na ⁺ , -1.15; K ⁺ , -0.52; NH ₄ ⁺ , +0.30; Ca ²⁺ , +1.00; Ba ²⁺ , -0.96	MPM	-	-	51.2	-	140 mM Na ⁺ background	[11]
	Li⁺-53 (<i>w</i> = 4 %), nitrophenyl benzyl ether (<i>w</i> = 62.7 %), KTpCIPB (<i>x</i> _i = 17 %), PVC (<i>w</i> = 31.8 %), TOPO (<i>w</i> = 0.96 %)	Na ⁺ , -0.72; K ⁺ , -0.64; NH ₄ ⁺ , -0.54; Ca ²⁺ , +0.62; Ba ²⁺ , -1.26	SSM	-	-	-	-		[11]
		Na ⁺ , -1.30; K ⁺ , -0.60; NH ₄ ⁺ , +0.23; Ca ²⁺ , +1.04; Ba ²⁺ , -1.00	MPM	-	-	-	-	140 mM Na ⁺ background	
Li⁺-54	Li⁺-54 (<i>w</i> = 2.5 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.74; K ⁺ , -3.27; Rb ⁺ , -3.35; Cs ⁺ , -3.20; NH ₄ ⁺ , -2.50; H ⁺ , -1.66; Mg ²⁺ , -3.08; Ca ²⁺ , -1.53; Sr ²⁺ , -1.80; Ba ²⁺ , -2.03	SSM	0.1	0.1	56.2	10 ^{-4.5} –10 ⁻¹	20 °C; r.o.o.g.	[12]
	Li⁺-54 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.85; K ⁺ , -3.21; Rb ⁺ , -3.06; Cs ⁺ , -3.79; NH ₄ ⁺ , -3.83; H ⁺ , -2.61; Mg ²⁺ , -2.40; Ca ²⁺ , -1.03; Sr ²⁺ , -0.89; Ba ²⁺ , -1.13	SSM	0.1	0.1	60	10 ⁻⁵ –10 ⁻¹	20 °C; $\lg P_{TLC} = 13$; r.o.o.g.	[12]
	Li⁺-54 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.04; K ⁺ , -2.87; Rb ⁺ , -3.54; Cs ⁺ , -3.60; NH ₄ ⁺ , -2.60; H ⁺ , -1.93; Mg ²⁺ , -4.37; Ca ²⁺ , -2.21; Sr ²⁺ , -3.67; Ba ²⁺ , -3.87	SSM	0.1	0.1	57.1	10 ⁻⁵ –10 ⁻¹	20 °C; r.o.o.g.	[12]
	Li⁺-54 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.05; K ⁺ , -2.93; Rb ⁺ , -3.33; Cs ⁺ , -3.33; NH ₄ ⁺ , -2.54; H ⁺ , -2.13; Mg ²⁺ , -3.33; Ca ²⁺ , -1.90; Sr ²⁺ , -1.99; Ba ²⁺ , -2.20	SSM	0.1	0.1	58.8	10 ⁻⁵ –10 ⁻¹	20 °C; r.o.o.g.	[12]
	Li⁺-54 (<i>w</i> = 2.5 %),	Na ⁺ , -2.11; K ⁺ , -3.38;	SSM	0.1	0.1	58.8	10 ⁻⁵	20 °C;	[12]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^n+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	KTpCIPB ($x_i = 15\%$), BBPA ($w = 65\%$), OH-PVC ($w = 33\%$)	Rb ⁺ , -3.53; Cs ⁺ , -3.53; NH ₄ ⁺ , -2.61; H ⁺ , -2.15; Mg ²⁺ , -3.41; Ca ²⁺ , -1.83; Sr ²⁺ , -1.87; Ba ²⁺ , -2.33					-10 ⁻¹	r.o.o.g.	
	Li⁺-54 ($w = 2.5\%$), CP ($w = 65\%$), KTpCIPB ($x_i = 15\%$), PVC ($w = 33\%$)	Na ⁺ , -2.16; K ⁺ , -3.20; Rb ⁺ , -3.00; Cs ⁺ , -3.60; NH ₄ ⁺ , -3.38; H ⁺ , -2.40; Mg ²⁺ , -3.33; Ca ²⁺ , -1.29; Sr ²⁺ , -1.20; Ba ²⁺ , -1.77	SSM	0.1	0.1	58.5	10 ⁻⁵ -10 ⁻¹	20 °C; r.o.o.g.	[12]
Li⁺-55	Li⁺-55 ($w = 2.5\%$), KTpCIPB ($x_i = 15\%$), oNPOE ($w = 65\%$), PVC ($w = 33\%$)	Na ⁺ , -1.32; K ⁺ , -2.07; Rb ⁺ , -2.20; Cs ⁺ , -2.25; NH ₄ ⁺ , -0.67; H ⁺ , -0.87; Mg ²⁺ , -3.13; Ca ²⁺ , +0.37; Sr ²⁺ , -0.50; Ba ²⁺ , -0.87	SSM	0.1	0.1	57.3	10 ⁻⁵ -10 ⁻¹	20 °C; r.o.o.g.	[12]
	Li⁺-55 ($w = 2.5\%$), KTpCIPB ($x_i = 15\%$), BBPA ($w = 65\%$), PVC ($w = 33\%$)	Na ⁺ , -1.61; K ⁺ , -2.53; Rb ⁺ , -2.87; Cs ⁺ , -3.06; NH ₄ ⁺ , -1.96; H ⁺ , -1.25; Mg ²⁺ , -3.97; Ca ²⁺ , -1.33; Sr ²⁺ , -2.06; Ba ²⁺ , -2.39	SSM	0.1	0.1	58.6	10 ⁻⁵ -10 ⁻¹	20 °C; r.o.o.g.	[12]
	Li⁺-55 ($w = 2.5\%$), CP ($w = 65\%$), KTpCIPB ($x_i = 15\%$), PVC ($w = 33\%$)	Na ⁺ , -1.33; K ⁺ , -2.13; Rb ⁺ , -1.87; Cs ⁺ , -2.20; NH ₄ ⁺ , -2.07; H ⁺ , -0.93; Mg ²⁺ , -2.74; Ca ²⁺ , -0.07; Sr ²⁺ , -0.70; Ba ²⁺ , -1.03	SSM	0.1	0.1	52.8	10 ⁻⁴ -10 ⁻¹	20 °C; r.o.o.g.	[12]
Li⁺-56	Li⁺-56 ($w = 1.2\%$), KTpCIPB ($x_i = 31.6\%$), oNPOE ($w = 65.6\%$), PVC ($w = 32.8\%$)	Na ⁺ , -1.4; K ⁺ , -2.3; H ⁺ , -3.5; Mg ²⁺ , -5.8; Ca ²⁺ , -4.5 Na ⁺ , -1.77 ^{††}	FIM	-	0.1; H ⁺ , 0.001	60.0 [†] 62.0 ^{††}	-	37 °C; [†] $c_{dl} = 10^{-4.6}$ M; ^{††} $c_{dl} = 10^{-2.6}$ M	[13]
	Li⁺-56 ($w = 1.2\%$), KTpCIPB ($x_i = 23.6\%$), oNPOE ($w = 65.6\%$), PVC ($w = 32.8\%$)	Na ⁺ , -2.08	FIM	-	-	59 [†] 60 ^{††}	-	37 °C; [†] $c_{dl} = 10^{-5.1}$ M; ^{††} $c_{dl} = 10^{-2.90}$ M	[14]
Li⁺-57	Li⁺-57 ($w = 1.2\%$), KTpCIPB ($x_i = 38.6\%$), PVC ($w = 32.8\%$),	Na ⁺ , -3.0; K ⁺ , -3.5; H ⁺ , -0.9; Mg ²⁺ , -5.7; Ca ²⁺ , -4.2	FIM	-	0.1; H ⁺ , 0.001	60.0 [†] 61.0 ^{††}	-	37 °C; [†] $c_{dl} = 10^{-5.0}$ M; ^{††} $c_{dl} = 10^{-4.1}$ M	[13]

† in water.

†† in 150 mM NaCl, 1.26 mM CaCl₂, and 4.3 mM KCl.

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	oNPOE (<i>w</i> = 65.6 %)	Na ⁺ , -2.92 ^{††}							
	Li⁺-57 (<i>w</i> = 1.2 %), KTpCIPB (<i>x_i</i> = 14.8 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.80	FIM	–	–	60 [†] 61 ^{††}	–	37 °C; [†] <i>c_{dl}</i> = 10 ^{-5.2} M; ^{††} <i>c_{dl}</i> = 10 ^{-3.6} M	[14]
Li⁺-58	Li⁺-58 (<i>w</i> = 1.2 %), KTpCIPB (<i>x_i</i> = 38.6 %), PVC (<i>w</i> = 32.8 %), oNPOE (<i>w</i> = 65.6 %)	Na ⁺ , -2.9; K ⁺ , -4.3; H ⁺ , +1.1; Mg ²⁺ , -5.3; Ca ²⁺ , -4.3 Na ⁺ , -3.25 ^{††}	FIM	–	0.1; H ⁺ , 0.001	50.0 [†] 61.0 ^{††}	–	37 °C; [†] <i>c_{dl}</i> = 10 ^{-5.0} M; ^{††} <i>c_{dl}</i> = 10 ^{-3.8} M	[13]
Li⁺-59	Li⁺-59 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 22 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -0.72; K ⁺ , -0.76 H ⁺ , +2.1; Mg ²⁺ , +0.11; Ca ²⁺ , -0.44	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-60	Li⁺-60 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 40 %), PVC (<i>w</i> = 27.9 %), oNPOE (<i>w</i> = 69.8 %)	Na ⁺ , -1.2; K ⁺ , -1.9 H ⁺ , +2.9; Mg ²⁺ , -0.35; Ca ²⁺ , -0.78	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-61	Li⁺-61 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 25 %), PVC (<i>w</i> = 27.9 %), oNPOE (<i>w</i> = 69.8 %)	Na ⁺ , -2.4; K ⁺ , -2.8 H ⁺ , +1.8; Mg ²⁺ , -2.8; Ca ²⁺ , -2.8	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-62	Li⁺-62 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 44 %), PVC (<i>w</i> = 27.9 %), oNPOE (<i>w</i> = 69.8 %)	Na ⁺ , -2.7; K ⁺ , -2.9 H ⁺ , +3.1; Mg ²⁺ , -2.6; Ca ²⁺ , -2.7	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-63	Li⁺-63 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 36 %), PVC (<i>w</i> = 27.9 %), oNPOE (<i>w</i> = 69.8 %)	Na ⁺ , -3.1; K ⁺ , -3.3 H ⁺ , +2.4; Mg ²⁺ , -3.0; Ca ²⁺ , -3.2 Na ⁺ , -3.0; K ⁺ , -3.5; Ca ²⁺ , -3.3	SSM MSM	1.0 0.1	1.0 0.1	57 ± 1	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
	Li⁺-63 (<i>w</i> = 1.4 % or 2.8 %), oNPOE (<i>w</i> = 69.9 % or 68.9 %), KTpCIPB (<i>x_i</i> = 28.6 % or 14.3 %), PVC (<i>w</i> = 27.9 % or 27.5 %)	Na ⁺ , -3.1; K ⁺ , -3.3; H ⁺ , +2.6; Mg ²⁺ , -3.0; Ca ²⁺ , -3.3 Na ⁺ , -2.6; K ⁺ , -2.9; H ⁺ , +2.4; Mg ²⁺ , -3.0; Ca ²⁺ , -3.2 Na ⁺ , -3.1; K ⁺ , -3.3 Na ⁺ , -3.0; K ⁺ , -3.5	SSM (<i>E_A</i> = <i>E_B</i>) SSM FIM	– 0.1 1 –	– 0.1 1 1	57	–	25 °C	[16]

† in water.

†† in 150 mM NaCl, 1.26 mM CaCl₂, and 4.3 mM KCl.

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	Li⁺-63 (<i>w</i> = 1.4 % or 2.8 %), oNPPE (<i>w</i> = 69.9 % or 68.9 %), KTpCIPB (<i>x_i</i> = 28.6 % or 14.3 %), PVC (<i>w</i> = 27.9 % or 27.5 %)	Na ⁺ , -3.3; K ⁺ , -3.6; H ⁺ , +2.7; Mg ²⁺ , -3.4; Ca ²⁺ , -3.2 Na ⁺ , -2.8; K ⁺ , -3.0; H ⁺ , +2.6; Mg ²⁺ , -3.2; Ca ²⁺ , -3.1 Na ⁺ , -3.3; K ⁺ , -3.6 Na ⁺ , -3.2; K ⁺ , -3.6	SSM (<i>E_A</i> = <i>E_B</i>)	–	–	59	–	25 °C	[16]
	Li⁺-63 (<i>w</i> = 1.4 % or 2.8 %), FNDPE (<i>w</i> = 69.9 % or 68.9 %), KTpCIPB (<i>x_i</i> = 28.6 % or 14.3 %), PVC (<i>w</i> = 27.9 % or 27.5 %)	Na ⁺ , -3.1; K ⁺ , -3.4; H ⁺ , +2.8; Mg ²⁺ , -3.1; Ca ²⁺ , -3.1 Na ⁺ , -2.7; K ⁺ , -2.8; H ⁺ , +2.7; Mg ²⁺ , -3.2; Ca ²⁺ , -3.1 Na ⁺ , -3.2; K ⁺ , -3.3	SSM (<i>E_A</i> = <i>E_B</i>)	–	–	59	–	25 °C	[16]
	Li⁺-63 (<i>w</i> = 1.4 % or 2.8 %), BEHS (<i>w</i> = 69.9 % or 68.9 %), KTpCIPB (<i>x_i</i> = 28.6 % or 14.3 %), PVC (<i>w</i> = 27.9 % or 27.5 %)	Na ⁺ , -2.8; K ⁺ , -3.1; H ⁺ , +3.0; Mg ²⁺ , -3.1; Ca ²⁺ , -3.0 Na ⁺ , -2.7; K ⁺ , -2.9; H ⁺ , +2.8; Mg ²⁺ , -3.2; Ca ²⁺ , -3.1 Na ⁺ , -2.9; K ⁺ , -3.2	SSM (<i>E_A</i> = <i>E_B</i>)	–	–	58	–	25 °C	[16]
	Li⁺-63 (<i>w</i> = 1.4 % or 2.8 %), TOPO (<i>w</i> = 69.9 % or 68.9 %), KTpCIPB (<i>x_i</i> = 28.6 % or 14.3 %), PVC (<i>w</i> = 27.9 % or 27.5 %)	Na ⁺ , -1.4; K ⁺ , -1.8; H ⁺ , +2.3; Mg ²⁺ , -0.63; Ca ²⁺ , +0.19 Na ⁺ , -1.4; K ⁺ , -1.6; H ⁺ , +2.0; Mg ²⁺ , -0.62; Ca ²⁺ , +0.21 Na ⁺ , -1.4; K ⁺ , -1.9	SSM (<i>E_A</i> = <i>E_B</i>)	–	–	51	–	25 °C	[16]
Li⁺-64	Li⁺-64 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 54 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.7; K ⁺ , -2.8 H ⁺ , +3.2; Mg ²⁺ , -2.3; Ca ²⁺ , -2.5	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-65	Li⁺-65 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 36 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.1; K ⁺ , -2.3 H ⁺ , +2.5; Mg ²⁺ , -1.8; Ca ²⁺ , -2.0	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-66	Li⁺-66 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 54 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -1.8; K ⁺ , -1.8 H ⁺ , +3.5; Mg ²⁺ , -1.3; Ca ²⁺ , -1.7	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]
Li⁺-67	Li⁺-67 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 36 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -0.85; K ⁺ , -0.98 H ⁺ , +3.7; Mg ²⁺ , +0.46; Ca ²⁺ , -0.81	SSM	1.0 0.1	1.0 0.1	–	–	<i>t_{resp}</i> = 30 s; 25 °C	[15]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, Bn^+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-68	Li⁺-68 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 54 %), PVC (<i>w</i> = 27.9 %), oNPOE (<i>w</i> = 69.8 %)	Na ⁺ , -0.72; K ⁺ , -0.82 H ⁺ , +4.6; Mg ²⁺ , +0.39; Ca ²⁺ , -0.71	SSM	1.0 0.1	1.0 0.1	–	–	<i>t</i> _{resp} = 30 s; 25 °C	[15]
Li⁺-69	Li⁺-69 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 49 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.3; K ⁺ , -2.3 H ⁺ , +3.4; Mg ²⁺ , -2.0; Ca ²⁺ , -2.2	SSM	1.0 0.1	1.0 0.1	–	–	<i>t</i> _{resp} = 30 s; 25 °C	[15]
Li⁺-70	Li⁺-70 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 68 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -1.7; K ⁺ , -1.4 H ⁺ , +3.5; Mg ²⁺ , -1.2; Ca ²⁺ , -1.3	SSM	1.0 0.1	1.0 0.1	–	–	<i>t</i> _{resp} = 30 s; 25 °C	[15]
Li⁺-71	Li⁺-71 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 40 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.1; K ⁺ , -1.4 H ⁺ , +4.0; Mg ²⁺ , -2.1; Ca ²⁺ , -2.1	SSM	1.0 0.1	1.0 0.1	–	–	<i>t</i> _{resp} = 30 s; 25 °C	[15]
Li⁺-72	Li⁺-72 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 59 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.0; K ⁺ , -1.3 H ⁺ , +4.0; Mg ²⁺ , -2.1; Ca ²⁺ , -2.1	SSM	1.0 0.1	1.0 0.1	–	–	<i>t</i> _{resp} = 30 s; 25 °C	[15]
Li⁺-73	Li⁺-73 (<i>w</i> = 3–7 %), TEHP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -1.00; K ⁺ , -1.77; Cs ⁺ , -2.07; Rb ⁺ , -2.14; NH ₄ ⁺ , -0.60; Mg ²⁺ , -3.32; Ca ²⁺ , -2.92; Ba ²⁺ , -3.28	SSM	0.1	0.1	60	10 ⁻⁴ –10 ⁻¹	<i>t</i> _{resp} = 60 s; 25 °C	[17]
	Li⁺-73 (<i>w</i> = 3–7 %), DOPP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -0.26; K ⁺ , -1.96; Rb ⁺ , -2.89; Cs ⁺ , -1.89; NH ₄ ⁺ , -0.92; Mg ²⁺ , -2.03; Ca ²⁺ , -2.01; Ba ²⁺ , -2.08	SSM	0.1	0.1	61	10 ⁻⁴ –10 ⁻¹	<i>t</i> _{resp} = 60 s; 25 °C	[17]
Li⁺-74	Li⁺-74 (<i>w</i> = 3–7 %), TEHP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -1.51; K ⁺ , -2.01; Rb ⁺ , -1.85; Cs ⁺ , -1.96; NH ₄ ⁺ , -0.54; Mg ²⁺ , -3.27; Ca ²⁺ , -2.85; Ba ²⁺ , -3.28	SSM	0.1	0.1	61	10 ⁻⁴ –10 ⁻¹	<i>t</i> _{resp} = 60 s; 25 °C	[17]
	Li⁺-74 (<i>w</i> = 1.5 %), TEHP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -1.0; K ⁺ , -1.7; Rb ⁺ , -1.4; Cs ⁺ , -1.7; NH ₄ ⁺ , -0.6; Mg ²⁺ , -2.8; Ca ²⁺ , -2.3; Ba ²⁺ , -3.3	SSM	0.1	0.1	–	–	r.o.o.g.	[17]
	Li⁺-74 (<i>w</i> = 3.0 %), TEHP (<i>w</i> ≈ 70 %)	Na ⁺ , -1.2; K ⁺ , -2.2; Rb ⁺ , -2.3;	SSM	0.1	0.1	–	–	r.o.o.g.	[17]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, Bn^+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	PVC ($w \approx 28\%$)	Cs ⁺ , -2.2; NH ₄ ⁺ , -0.8; Mg ²⁺ , -3.0; Ca ²⁺ , -2.9; Ba ²⁺ , -3.2							
	Li⁺-74 ($w = 5.0\%$), TEHP ($w \approx 70\%$), PVC ($w \approx 28\%$)	Na ⁺ , -1.3; K ⁺ , -2.3; Rb ⁺ , -2.1; Cs ⁺ , -2.3; NH ₄ ⁺ , -0.7; Mg ²⁺ , -2.8; Ca ²⁺ , -2.8; Ba ²⁺ , -3.4	SSM	0.1	0.1	-	-	r.o.o.g.	[17]
	Li⁺-74 ($w = 7.0\%$), TEHP ($w \approx 70\%$), PVC ($w \approx 28\%$)	Na ⁺ , -1.4; K ⁺ , -2.4; Rb ⁺ , -2.6; Cs ⁺ , -2.4; NH ₄ ⁺ , -1.0; Mg ²⁺ , -3.4; Ca ²⁺ , -3.2; Ba ²⁺ , -4.2	SSM	0.1	0.1	-	-	r.o.o.g.	[17]
	Li⁺-74 ($w = 3-7\%$), KTpCIPB ($x_i = 30\%$), TEHP ($w \approx 70\%$), PVC ($w \approx 28\%$)	Na ⁺ , -1.5; K ⁺ , -2.5; Rb ⁺ , -2.8; Cs ⁺ , -2.6; NH ₄ ⁺ , -1.2; Mg ²⁺ , -3.5; Ca ²⁺ , -3.7; Ba ²⁺ , -4.2	SSM	0.1	0.1	60	10 ⁻⁵ –10 ⁻¹	$t_{resp} < 2$ min; pH > 2; r.o.o.g.	[17]
	Li⁺-74 ($w = 3-7\%$), PVC ($w \approx 28\%$), DOPP ($w \approx 70\%$)	Na ⁺ , -0.99; K ⁺ , -0.82; Rb ⁺ , -1.85; Cs ⁺ , -1.92; NH ₄ ⁺ , -0.68; Mg ²⁺ , -1.82; Ca ²⁺ , -1.11; Ba ²⁺ , -1.68	SSM	0.1	0.1	58	10 ⁻⁴ –10 ⁻¹	25 °C	[17]
	Li⁺-74 ($w = 3-7\%$), KTpCIPB ($x_i = 30\%$), DOPP ($w \approx 70\%$), PVC ($w \approx 28\%$)	Na ⁺ , -1.1; K ⁺ , -0.8; Rb ⁺ , -1.85; Cs ⁺ , -1.9; NH ₄ ⁺ , -0.6; Mg ²⁺ , -1.8; Ca ²⁺ , -1.2; Ba ²⁺ , -1.7	SSM	0.1	0.1	58	10 ⁻⁴ –10 ⁻¹	r.o.o.g.	[17]
	Li⁺-74 ($w = 3-7\%$), DOA ($w \approx 70\%$), KTpCIPB ($x_i = 30\%$), PVC ($w \approx 28\%$)	Na ⁺ , -0.9; K ⁺ , -1.6; Rb ⁺ , -1.3; Cs ⁺ , -1.4; NH ₄ ⁺ , -0.6; Mg ²⁺ , -3.1; Ca ²⁺ , -2.8; Ba ²⁺ , -3.0	SSM	0.1	0.1	-	-		[17]
	Li⁺-74 ($w = 3-7\%$), KTpCIPB ($x_i = 30\%$), BEHA ($w \approx 70\%$), PVC ($w \approx 28\%$)	Na ⁺ , -1.2; K ⁺ , -1.7; Rb ⁺ , -1.9; Cs ⁺ , -1.7; NH ₄ ⁺ , -1.0; Mg ²⁺ , -2.7; Ca ²⁺ , -2.5; Ba ²⁺ , -2.3	SSM	0.1	0.1	-	-	r.o.o.g.	[17]
	Li⁺-74 ($w = 3-7\%$), KTpCIPB ($x_i = 30\%$), oNPOE ($w \approx 70\%$)	Na ⁺ , -0.2; K ⁺ , -0.8; Rb ⁺ , -1.4; Cs ⁺ , -1.5; NH ₄ ⁺ , -0.3; Mg ²⁺ , -2.2; Ca ²⁺ , -2.4	SSM	0.1	0.1	-	-	r.o.o.g.	[17]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-75	PVC (<i>w</i> ≈ 28 %)	Ba ²⁺ , -2.5							
	Li⁺-75 (<i>w</i> = 3–7 %), TEHP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -1.17; K ⁺ , -1.89; Rb ⁺ , -2.04; Cs ⁺ , -2.09; NH ₄ ⁺ , -1.28; Mg ²⁺ , -3.07; Ca ²⁺ , -2.89; Ba ²⁺ , -3.12	SSM	0.1	0.1	61	10 ⁻⁴ –10 ⁻¹	<i>t</i> _{resp} = 60 s; 25 °C	[17]
Li⁺-76	Li⁺-75 (<i>w</i> = 3–7 %), DOPP (<i>w</i> ≈ 70 %), PVC (<i>w</i> ≈ 28 %)	Na ⁺ , -1.27; K ⁺ , -2.22; Rb ⁺ , -2.35; Cs ⁺ , -2.31; NH ₄ ⁺ , -1.06; Mg ²⁺ , -2.00; Ca ²⁺ , -2.64; Ba ²⁺ , -3.06	SSM	0.1	0.1	55	10 ⁻⁴ –10 ⁻¹	<i>t</i> _{resp} = 60 s; 25 °C	[17]
	Li⁺-76 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.75; K ⁺ , -2.4; Mg ²⁺ , -3.6; Ca ²⁺ , -0.9; H ⁺ , -1.5	SSM	0.1	0.1	59	10 ^{-4.8} –10 ⁻¹	20 °C; r.o.o.g.	[18]
	Li⁺-76 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.47	SSM	0.1	0.1	60	10 ^{-5.1} –10 ⁻¹	20 °C	[18]
Li⁺-77	Li⁺-76 (<i>w</i> = 2.5 %), TEHP (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.76	SSM	0.1	0.1	58	10 ^{-4.5} –10 ⁻¹	20 °C	[18]
	Li⁺-76 (<i>w</i> = 2.5 %), PVC (<i>w</i> = 33 %), TEHP (<i>w</i> = 65 %), KTpCIPB (<i>x</i> _i = 15 %)	Na ⁺ , -1.4	SSM	0.1	0.1	60	10 ^{-4.9} –10 ⁻¹	20 °C	[18]
	Li⁺-76 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), BEHS (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.75	SSM	0.1	0.1	59	10 ^{-4.5} –10 ⁻¹	20 °C	[18]
	Li⁺-77 (<i>w</i> = 2.5 %), PVC (<i>w</i> = 33 %), BBPA (<i>w</i> = 65 %)	Na ⁺ , -1.6; K ⁺ , -2.6; H ⁺ , -1.8; Mg ²⁺ , -3.5; Ca ²⁺ , -0.6	SSM	0.1	0.1	56	10 ^{-4.8} –10 ⁻¹	20 °C; r.o.o.g.	[18]
	Li⁺-77 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.6 Na ⁺ , -1.8	SSM FIM	0.1 –	0.1 0.1	55	10 ^{-5.0} –10 ⁻¹	20 °C	[18]
Li⁺-78	Li⁺-77 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.4	SSM	0.1	0.1	55	10 ^{-4.8} –10 ⁻¹	20 °C	[18]
	Li⁺-77 (<i>w</i> = 2.5 %), KTpCIPB (<i>x</i> _i = 15 %), BEHS (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.65	SSM	0.1	0.1	59	10 ^{-5.0} –10 ⁻¹	20 °C	[18]
	Li⁺-78 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.80; K ⁺ , -3.6; H ⁺ , -3.1; Mg ²⁺ , -4.1; Ca ²⁺ , -0.7;	SSM	0.1	0.1	55	10 ^{-5.2} –10 ⁻¹	r.o.o.g.	[18]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
		Na ⁺ , -2.0	FIM	–	0.1				
	Li⁺-78 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.75 Na ⁺ , -1.9	SSM FIM	0.1 –	0.1 0.1	58	10 ^{-5.1} –10 ⁻¹	20 °C	[18]
	Li⁺-78 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.2 Na ⁺ , -1.6	SSM FIM	0.1 –	0.1 0.1	60	10 ^{-5.5} –10 ⁻¹	20 °C	[18]
	Li⁺-78 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BEHS (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.45 Na ⁺ , -1.6	SSM FIM	0.1 –	0.1 0.1	58	10 ^{-5.0} –10 ⁻¹	20 °C	[18]
	Li⁺-78 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), TEHP (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.6 Na ⁺ , -1.9	SSM FIM	0.1 –	0.1 0.1	55	10 ^{-5.0} –10 ⁻¹	20 °C	[18]
Li⁺-79	Li⁺-79 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.25; K ⁺ , -0.4; H ⁺ , +1.1; Mg ²⁺ , -2.2; Ca ²⁺ , -1.0	SSM	0.1	0.1	45	10 ^{-3.8} –10 ⁻¹	20 °C; r.o.o.g.	[18]
	Li⁺-79 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.1	SSM	0.1	0.1	51	10 ⁻⁴ –10 ⁻¹	20 °C	[18]
	Li⁺-79 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.75	SSM	0.1	0.1	51	10 ⁻⁴ –10 ⁻¹	20 °C	[18]
Li⁺-80	Li⁺-80 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , +1.5; K ⁺ , -0.2; H ⁺ , +0.1; Mg ²⁺ , -2.2; Ca ²⁺ , +0.6	SSM	0.1	0.1	50	10 ^{-3.5} –10 ⁻¹	20 °C; r.o.o.g.	[18]
	Li⁺-80 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , +1.23	SSM	0.1	0.1	50	10 ⁻⁴ –10 ⁻¹	20 °C	[18]
	Li⁺-80 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BEHS (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , +1.4	SSM	0.1	0.1	51	10 ⁻⁴ –10 ⁻¹	20 °C	[18]
Li⁺-81	Li⁺-81 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.6; K ⁺ , -2.5; H ⁺ , -1.2; Mg ²⁺ , -3.9; Ca ²⁺ , -1.3	SSM	0.1	0.1	58	10 ^{-5.0} –10 ⁻¹	20 °C; r.o.o.g.	[18]
	Li⁺-81 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.5	SSM	0.1	0.1	59	10 ^{-5.0} –10 ⁻¹	20 °C	[18]
Li⁺-82	Li⁺-82 (<i>w</i> = 2.5 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.04; K ⁺ , -2.9; H ⁺ , -1.9; Mg ²⁺ , -4.1; Ca ²⁺ , -2.2	SSM	0.1	0.1	59	10 ^{-5.1} –10 ⁻¹	20 °C; r.o.o.g.	[18]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li ⁺ -83	Li ⁺ -82 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 15 %), BBPA (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.05	SSM	0.1	0.1	59	10 ^{-5.1} -10 ⁻¹	20 °C	[18]
	Li ⁺ -82 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 15 %), TEHP (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.4	FIM	–	0.1				
	Li ⁺ -82 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 15 %), TEHP (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.96	SSM	0.1	0.1	58	10 ^{-5.0} -10 ⁻¹	20 °C	[18]
	Li ⁺ -82 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 15 %), BEHS (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.86	SSM	0.1	0.1	59	10 ^{-5.0} -10 ⁻¹	20 °C	[18]
	Li ⁺ -82 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 15 %), oNPOE (<i>w</i> = 65 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.85	SSM	0.1	0.1	59	10 ^{-5.0} -10 ⁻¹	20 °C	[18]
	Li ⁺ -83 (<i>w</i> = 2.5 %), KTPCIPB (<i>x</i> _i = 17 %), TEHP (<i>w</i> = 64 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.83; K ⁺ , -4.25; Cs ⁺ , -4.56; NH ₄ ⁺ , -3.23; Mg ²⁺ , -5.78; Ca ²⁺ , -5.46; Ba ²⁺ , -5.53	SSM	–	–	58.2	10 ^{-5.0} -10 ⁻¹	25 °C; <i>t</i> _{resp} < 30 s	[19]
	Li ⁺ -83 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.4; K ⁺ , -4.2; NH ₄ ⁺ , -3.6; Mg ²⁺ , -4.9; Ca ²⁺ , -4.9	MPM	–	Δ <i>c</i> _B = 0.1	56.8	–	artificial serum background [†] ; <i>c</i> _{dl} = 10 ^{-5.86} M	[3]
	<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.8; K ⁺ , -4.6; NH ₄ ⁺ , -5.4; Mg ²⁺ , -5.7; Ca ²⁺ , -5.4	MPM	–	Δ <i>c</i> _B = 0.1	55.7	–	artificial serum background [†] ; <i>c</i> _{dl} = 10 ^{-6.09} M	[3]
	<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.8 %), KTPCIPB (<i>x</i> _i = 26 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.1; K ⁺ , -3.7; NH ₄ ⁺ , -4.2; Mg ²⁺ , -4.7; Ca ²⁺ , -4.8	MPM	–	Δ <i>c</i> _B = 0.1	58.9	–	artificial serum background [†] ; <i>c</i> _{dl} = 10 ^{-6.47} M	[3]
	<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.8 %), KTPCIPB (<i>x</i> _i = 70 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.0; K ⁺ , -3.5; NH ₄ ⁺ , -4.0; Mg ²⁺ , -4.4; Ca ²⁺ , -4.9	MPM	–	Δ <i>c</i> _B = 0.1	60.3	–	artificial serum background [†] ; <i>c</i> _{dl} = 10 ^{-6.30} M	[3]
<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), DOS (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.6; K ⁺ , -4.8; NH ₄ ⁺ , -5.3; Mg ²⁺ , -5.5; Ca ²⁺ , -5.7	MPM	–	Δ <i>c</i> _B = 0.1	58.1	–	artificial serum background [†] ; <i>c</i> _{dl} = 10 ^{-6.80} M	[3]	

[†] artificial serum background: NaH₂PO₄, 8 mM; Na₂HPO₄, 1.5 mM; CaCl₂, 2.0 mM; MgCl₂, 0.8 mM; KCl, 4.5 mM; NH₄Cl, 0.05 mM; glucose, 4.7 mM; urea, 2.5 mM; NaCl, 135 mM; 145 mM; and 155 mM.

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), DBP (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.6; K ⁺ , -4.6; NH ₄ ⁺ , -4.7; Mg ²⁺ , -5.4; Ca ²⁺ , -5.5	MPM	–	$\Delta c_B = 0.1$	56.6	–	artificial serum background [†] ; $c_{dl} = 10^{-6.49}$ M	[3]
	<i>cis</i> -Li ⁺ -83 (<i>w</i> = 1.2 %), TEHP (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -2.5; K ⁺ , -5.7; NH ₄ ⁺ , -3.4; Mg ²⁺ , -2.9; Ca ²⁺ , -4.4	MPM	–	$\Delta c_B = 0.1$	50.7	–	artificial serum background [†] ; $c_{dl} = 10^{-4.50}$ M	[3]
Li ⁺ -84	Li ⁺ -84 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 19 %), TEHP (<i>w</i> = 64 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.38; K ⁺ , -2.39; Cs ⁺ , -2.62; NH ₄ ⁺ , -1.11; Mg ²⁺ , -3.83; Ca ²⁺ , -3.49; Ba ²⁺ , -3.74	SSM	–	–	–	10 ⁻³ -1	140 mM Na ⁺ background; 25 °C	[19]
Li ⁺ -85	Li ⁺ -85 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 22 %), TEHP (<i>w</i> = 64 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -1.01; K ⁺ , -1.83; NH ₄ ⁺ , -0.51; Mg ²⁺ , -3.10; Ca ²⁺ , -2.76; Ba ²⁺ , -3.14	SSM	–	–	–	–	25 °C	[19]
Li ⁺ -86	Li ⁺ -86 (<i>w</i> = 2.5 %), KTpCIPB (<i>x_i</i> = 24 %), TEHP (<i>w</i> = 64 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.99; K ⁺ , -1.80; NH ₄ ⁺ , -0.50; Mg ²⁺ , -3.08; Ca ²⁺ , -2.71; Ba ²⁺ , -3.04	SSM	–	–	–	–	25 °C	[19]
Li ⁺ -87	Li ⁺ -87 (<i>w</i> = 1 %), DOPP (<i>w</i> = 67 %), PVC (<i>w</i> = 32 %)	Na ⁺ , -1.55; K ⁺ , -2.24; Mg ²⁺ , -3.84; Ca ²⁺ , -2.86; Ba ²⁺ , -3.15	SSM	0.01	0.01	58.5	–	$c_{dl} = 10^{-5.3}$ M; 25.0 ± 0.5 °C	[20]
Li ⁺ -88	Philips (561-Li)	Na ⁺ , -1.33	FIM	–	–	61* 47**	–	37 °C $c_{dl} = 10^{-4.5}$ M*; $c_{dl} = 10^{-2.15}$ M**	[14]
Li ⁺ -89	Li ⁺ -89 (<i>w</i> = 1.2 %), KTpCIPB (<i>x_i</i> = 24.8 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -0.98	FIM	–	–	61* 26**	–	37 °C $c_{dl} = 10^{-5.0}$ M*; $c_{dl} = 10^{-1.8}$ M**	[14]
Li ⁺ -90	Li ⁺ -90 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 22.2–33.3 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , -3.3; K ⁺ , -3.7; Rb ⁺ , -3.6; Cs ⁺ , -3.4; NH ₄ ⁺ , -3.8; H ⁺ , -3.1; Mg ²⁺ , -5.0; Ca ²⁺ , -5.5; Sr ²⁺ , -5.7; Ba ²⁺ , -5.7	FIM	0.1	0.1	N	10 ⁻⁶ -1	25.0 ± 0.5 °C; r.o.o.g. & table	[21]
	Li ⁺ -90 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 22.2–33.3 %), PVC (<i>w</i> = 26–27 %)	Na ⁺ , -3.0; K ⁺ , -3.3; Rb ⁺ , -3.3; Cs ⁺ , -3.2; NH ₄ ⁺ , -3.9; H ⁺ , -2.7; Mg ²⁺ , -4.5; Ca ²⁺ , -5.0;	FIM	0.1	0.1	–	–	25.0 ± 0.5 °C; r.o.o.g.	[21]

[†] artificial serum background: NaH₂PO₄, 8 mM; Na₂HPO₄, 1.5 mM; CaCl₂, 2.0 mM; MgCl₂, 0.8 mM; KCl, 4.5 mM; NH₄Cl, 0.05 mM; glucose, 4.7 mM; urea, 2.5 mM; NaCl, 135 mM; 145 mM; and 155 mM.

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	BEHP (<i>w</i> = 70 %)	Sr ²⁺ , -5.3; Ba ²⁺ , -5.5							
	Li⁺-90 (<i>w</i> = 2–3 %), KTPCIPB (<i>x_i</i> = 22.2–33.3 %), PVC (<i>w</i> = 26–27 %), oNPOE (<i>w</i> = 70 %)	Na ⁺ , -2.8; K ⁺ , -3.5; Rb ⁺ , -3.6; Cs ⁺ , -3.3; NH ₄ ⁺ , -4.0; H ⁺ , -2.7; Mg ²⁺ , -4.3; Ca ²⁺ , -5.0; Sr ²⁺ , -5.2; Ba ²⁺ , -5.2	FIM	0.1	0.1	–	–	25.0 ± 0.5 °C; [21] r.o.o.g.	
	Li⁺-90 (<i>w</i> = 2–3 %), KTPCIPB (<i>x_i</i> = 22.2–33.3 %), PVC (<i>w</i> = 26–27 %), oNPPE (<i>w</i> = 70 %)	Na ⁺ , -2.9; K ⁺ , -3.4; Rb ⁺ , -3.4; Cs ⁺ , -3.3; NH ₄ ⁺ , -3.8; H ⁺ , -2.8; Mg ²⁺ , -4.2; Ca ²⁺ , -4.9; Sr ²⁺ , -5.3; Ba ²⁺ , -5.4	FIM	0.1	0.1	–	–	25.0 ± 0.5 °C; [21] r.o.o.g.	
Li⁺-91	Li⁺-91 (<i>w</i> = 1.2 %), KTPCIPB (<i>x_i</i> = 36.6 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.92	FIM	–	0.1	61 60 [†]	10 ^{-5.1} 10 ^{-3.8†}	37 °C; [22] clinical background [†]	
Li⁺-92	Li⁺-92 (<i>w</i> = 1.2 %), KTPCIPB (<i>x_i</i> = 36.6 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -3.25	FIM	–	0.1	61 50 [†]	10 ^{-5.2} 10 ^{-4.1†}	37 °C; [22] clinical background [†]	
Li⁺-93	Li⁺-93 (<i>w</i> = 1.2 %), KTPCIPB (<i>x_i</i> = 46.2 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.93	FIM	–	0.1	54 61 [†]	10 ^{-5.5} 10 ^{-3.7†}	37 °C; [22] clinical background [†]	
Li⁺-94	Li⁺-94 (<i>w</i> = 1.2 %), KTPCIPB (<i>x_i</i> = 28.7 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.25 protein: significant interference	FIM	–	0.1	61 60 [†]	10 ^{-4.4} 10 ^{-3.2†}	37 °C; [22] clinical background [†]	
Li⁺-95	Li⁺-95 (<i>w</i> = 1.2 %), KTPCIPB (<i>x_i</i> = 31.4 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.30	FIM	–	0.1	60 61 [†]	10 ^{-5.0} 10 ^{-3.1†}	37 °C; [22] clinical background [†]	
Li⁺-96	mixture of Li⁺-96 , Li⁺-97 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.6 %), KTPCIPB (<i>x_i</i> = 48.2 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.30	FIM	–	0.1	59 61 [†]	10 ^{-4.9} 10 ^{-3.1†}	37 °C; [22] clinical background [†]	

[†] clinical background: NaCl 150 mM; KCl 4.3 mM; CaCl₂ 1.26 mM; MgCl₂ 0.9 mM

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-97	Li⁺-97 (<i>w</i> = 1.2 %), KTpCIPB (<i>x_i</i> = 48.2 %), oNPOE (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , -2.30	FIM	–	0.1	58 60 [†]	10 ^{-4.9} 10 ^{-3.1} [†]	37 °C; clinical background [†]	[22]
Li⁺-98	Li⁺-98 (<i>w</i> = 1.4 %), KTpCIPB (<i>x_i</i> = 64.2 %), oNPOE (<i>w</i> = 69.8 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.6; K ⁺ , -2.9; H ⁺ , +3.5; Mg ²⁺ , -3.0; Ca ²⁺ , -3.2	SSM	1	1	–	–	r.o.o.g.	[23]
Li⁺-99	Li⁺-99 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 65.9 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.5; K ⁺ , -3.1; H ⁺ , +3.4; Mg ²⁺ , -3.4; Ca ²⁺ , -3.4	SSM	1	1	–	–	r.o.o.g.	[23]
	Li⁺-99 (<i>w</i> = 1.4 %), FNDPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 65.9 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.7; K ⁺ , -2.9; H ⁺ , +2.3; Mg ²⁺ , -3.0; Ca ²⁺ , -3.2	SSM	1	1	–	–	r.o.o.g.	[23]
	Li⁺-99 (<i>w</i> = 1.4 %), oNPPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 65.9 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.2; K ⁺ , -2.8; H ⁺ , +3.7; Mg ²⁺ , -2.5; Ca ²⁺ , -3.2	SSM	1	1	–	–	r.o.o.g.	[23]
Li⁺-100	Li⁺-100 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 67.6 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -3.23; K ⁺ , -3.75; H ⁺ , +2.57 Mg ²⁺ , -3.25; Ca ²⁺ , -3.35	SSM	1	1	56	–	fresh electrode	[23]
		Na ⁺ , -3.21; K ⁺ , -3.68; H ⁺ , +2.46; Mg ²⁺ , -3.10; Ca ²⁺ , -3.18	SSM	1	1	56	–	1 d old electrode	
		Na ⁺ , -3.21; K ⁺ , -3.60; H ⁺ , +2.43; Mg ²⁺ , -3.07; Ca ²⁺ , -3.19	SSM	1	1	54	–	3 d old electrode	
		Na ⁺ , -3.11; K ⁺ , -3.40; H ⁺ , +2.37; Ca ²⁺ , -3.32	SSM	1	1	51	–	4 d old electrode	
		Na ⁺ , -3.10; K ⁺ , -3.36; Mg ²⁺ , -2.79; Ca ²⁺ , -2.96	SSM	1	1	51	–	5 d old electrode	
		Na ⁺ , -3.04; K ⁺ , -3.26; H ⁺ , +2.35; Mg ²⁺ , -2.55; Ca ²⁺ , -2.86	SSM	1	1	51	–	6 d old electrode	
		Na ⁺ , -3.23; K ⁺ , +3.71; H ⁺ , +3.45; Mg ²⁺ , -3.48; Ca ²⁺ , -3.48	SSM	1	1	–	–		
		Na ⁺ , -3.1; K ⁺ , -3.6; Ca ²⁺ , -3.3	FIM	–	Na ⁺ , 0.14; K ⁺ , 1.0; Ca ²⁺ , 0.1	–	–	fresh electrode	

[†] clinical background: NaCl 150 mM; KCl 4.3 mM; CaCl₂ 1.26 mM; MgCl₂ 0.9 mM

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	Li⁺-100 (<i>w</i> = 0.8 %), oNPOE (<i>w</i> = 70.2 %), KTpCIPB (<i>x_i</i> = 67.6 %), PVC (<i>w</i> = 28.1 %)	Na ⁺ , -2.00; K ⁺ , -2.08; H ⁺ , +2.32; Mg ²⁺ , -3.19; Ca ²⁺ , -3.36	SSM	1	1	-	-		[23]
		Na ⁺ , -2.6; K ⁺ , -3.5; Ca ²⁺ , -3.7	FIM	-	Na ⁺ , 0.14; K ⁺ , 1.0; Ca ⁺ , 0.1	-	-		
	Li⁺-100 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 70.4 %), PVC (<i>w</i> = 28.2 %)	Na ⁺ , -0.29; K ⁺ , -0.42; H ⁺ , +2.29; Mg ²⁺ , -1.13; Ca ²⁺ , -1.33	SSM	1	1	-	-		[23]
	Li⁺-100 (<i>w</i> = 2.8 %), oNPOE (<i>w</i> = 68.9 %), KTpCIPB (<i>x_i</i> = 67.6 %), PVC (<i>w</i> = 27.5 %)	Na ⁺ , -2.97; K ⁺ , -3.47; H ⁺ , +2.83; Mg ²⁺ , -3.62; Ca ²⁺ , -3.71	SSM	1	1	-	-		[23]
		Na ⁺ , -2.8; K ⁺ , -3.4; Ca ²⁺ , -3.5	FIM	-	Na ⁺ , 0.14; K ⁺ , 1.0; Ca ⁺ , 0.1	-	-		
	Li⁺-100 (<i>w</i> = 1.4 %), FNDPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 67.6 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.8; K ⁺ , -3.0; H ⁺ , +3.2; Mg ²⁺ , -3.4; Ca ²⁺ , -3.5	SSM	1	1	-	-	r.o.o.g.	[23]
	Li⁺-100 (<i>w</i> = 1.4 %), oNPPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 67.6 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.2; K ⁺ , -2.5; H ⁺ , +2.9; Mg ²⁺ , -3.2; Ca ²⁺ , -3.7	SSM	1	1	-	-	r.o.o.g.	[23]
Li⁺-101	Li⁺-101 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 69.3 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -3.0; K ⁺ , -3.6; H ⁺ , +2.9; Mg ²⁺ , -3.3; Ca ²⁺ , -3.3	SSM	1	1	-	-	r.o.o.g.	[23]
	Li⁺-101 (<i>w</i> = 1.4 %), FNDPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 69.3 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.0; K ⁺ , -2.2; H ⁺ , +3.2; Mg ²⁺ , -2.5; Ca ²⁺ , -3.2	SSM	1	1	-	-	r.o.o.g.	[23]
	Li⁺-101 (<i>w</i> = 1.4 %), oNPPE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 69.3 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -2.5; K ⁺ , -2.9; H ⁺ , +3.3; Mg ²⁺ , -3.2; Ca ²⁺ , -3.5	SSM	1	1	-	-	r.o.o.g.	[23]
Li⁺-102	Li⁺-102 (<i>w</i> = 1.4 %), oNPOE (<i>w</i> = 69.8 %), KTpCIPB (<i>x_i</i> = 71.0 %), PVC (<i>w</i> = 27.9 %)	Na ⁺ , -3.0; K ⁺ , -3.5; H ⁺ , +3.0; Mg ²⁺ , -3.4; Ca ²⁺ , -3.4	SSM	1	1	-	-	r.o.o.g.	[23]

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-103	Li⁺-103 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), BBPA (<i>w</i> = 70 %), PVC (<i>w</i> = 26–27 %)	Na ⁺ , –0.9; K ⁺ , –1.2; Rb ⁺ , –1.5; Cs ⁺ , –1.6; NH ₄ ⁺ , –1.9; Mg ²⁺ , –4.2; Ca ²⁺ , –4.1; Sr ²⁺ , –4.2; Ba ²⁺ , –4.2	SSM	0.1	0.1	–	–	25 ± 0.5 °C	[24]
Li⁺-104	Li⁺-104 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), BBPA (<i>w</i> = 70 %), PVC (<i>w</i> = 26–27 %)	Na ⁺ , –2.6; K ⁺ , –2.9; Rb ⁺ , –3.0; Cs ⁺ , –3.0; NH ₄ ⁺ , –3.0; Mg ²⁺ , –5.3; Ca ²⁺ , –4.7; Sr ²⁺ , –5.0; Ba ²⁺ , –5.0	SSM	0.1	0.1	–	–	25 ± 0.5 °C; $\lg P_{TLC} = 14.0 \pm 0.2$	[24]
Li⁺-105	Li⁺-105 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), BBPA (<i>w</i> = 70 %), PVC (<i>w</i> = 26–27 %)	Na ⁺ , –2.8; K ⁺ , –3.3; Rb ⁺ , –3.7; Cs ⁺ , –3.6; NH ₄ ⁺ , –3.7; Mg ²⁺ , –6.1; Ca ²⁺ , –5.2; Sr ²⁺ , –5.0; Ba ²⁺ , –5.0	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C; $\lg P_{TLC} = 14.9 \pm 0.2$	[24]
Li⁺-106	Li⁺-106 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), BBPA (<i>w</i> = 70 %), PVC (<i>w</i> = 26–27 %)	Na ⁺ , –2.9; K ⁺ , –3.4; Rb ⁺ , –3.6; Cs ⁺ , –3.7; NH ₄ ⁺ , –3.5; Mg ²⁺ , –5.0; Ca ²⁺ , –5.0; Sr ²⁺ , –5.1; Ba ²⁺ , –5.0	SSM	0.1	0.1	–	–	25 ± 0.5 °C; $\lg P_{TLC} = 16.3 \pm 0.3$	[24]
Li⁺-107	Li⁺-107 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –3.0; K ⁺ , –3.6; Rb ⁺ , –3.6; Cs ⁺ , –3.5; NH ₄ ⁺ , –3.7; Mg ²⁺ , –5.0; Ca ²⁺ , –4.9; Sr ²⁺ , –5.0; Ba ²⁺ , –5.0	SSM	0.1	0.1	N	2 × 10 ^{–6} –10 ^{–1}	25 ± 0.5 °C; $\lg P_{TLC} = 16.5 \pm 0.3$	[24]
		Na ⁺ , –3.1; K ⁺ , –3.6; Rb ⁺ , –3.7; Cs ⁺ , –3.6; NH ₄ ⁺ , –3.8; Mg ²⁺ , <–5.0; Ca ²⁺ , <–5.0; Sr ²⁺ , <–5.0; Ba ²⁺ , <–5.0	FIM	–	0.15			2 × 10 ^{–6} –10 ^{–3*} * in 150 mM NaCl	
Li⁺-108	Li⁺-108 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –1.9; K ⁺ , –2.1; Rb ⁺ , –2.3; Cs ⁺ , –2.5; NH ₄ ⁺ , –2.5; Mg ²⁺ , –2.8; Ca ²⁺ , –2.9; Sr ²⁺ , –2.8; Ba ²⁺ , –2.9	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-109	Li⁺-109 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –2.5; K ⁺ , –3.2; Rb ⁺ , –3.4; Cs ⁺ , –3.5; NH ₄ ⁺ , –3.4; Mg ²⁺ , –4.3; Ca ²⁺ , –4.9; Sr ²⁺ , –4.9; Ba ²⁺ , –5.2	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-110	Li⁺-110 (<i>w</i> = 2–3 %), KTpCIPB (<i>x_i</i> = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –2.3; K ⁺ , –3.0; Rb ⁺ , –3.2; Cs ⁺ , –3.1; NH ₄ ⁺ , –3.0; Mg ²⁺ , –4.0; Ca ²⁺ , –4.2; Sr ²⁺ , –4.2; Ba ²⁺ , –4.1	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]

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Table 2: Li⁺-Selective Electrodes (*Continued*)

ionophore	membrane composition	$\lg K_{Li^+, B^{n+}}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
Li⁺-111	Li⁺-111 (<i>w</i> = 2–3 %), KTpCIPB (<i>x</i> _i = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –2.0; K ⁺ , –2.7; Rb ⁺ , –2.8; Cs ⁺ , –2.5; NH ₄ ⁺ , –3.0; Mg ²⁺ , –4.2; Ca ²⁺ , –5.0; Sr ²⁺ , –4.7; Ba ²⁺ , –4.7	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-112	Li⁺-112 (<i>w</i> = 2–3 %), KTpCIPB (<i>x</i> _i = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –2.8; K ⁺ , –3.7; Rb ⁺ , –3.5; Cs ⁺ , –3.3; NH ₄ ⁺ , –3.5; Mg ²⁺ , –5.0; Ca ²⁺ , –3.9; Sr ²⁺ , –4.7; Ba ²⁺ , –4.7	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-113	Li⁺-113 (<i>w</i> = 2–3 %), KTpCIPB (<i>x</i> _i = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –1.9; K ⁺ , –2.0; Rb ⁺ , –2.0; Cs ⁺ , –2.0; NH ₄ ⁺ , –2.0; Mg ²⁺ , –5.0; Ca ²⁺ , –4.1; Sr ²⁺ , –4.5; Ba ²⁺ , –4.4	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-114	Li⁺-114 (<i>w</i> = 2–3 %), KTpCIPB (<i>x</i> _i = 20–30 %), PVC (<i>w</i> = 26–27 %), BBPA (<i>w</i> = 70 %)	Na ⁺ , –2.4; K ⁺ , –3.0; Rb ⁺ , –3.2; Cs ⁺ , –3.3; NH ₄ ⁺ , –3.2; Mg ²⁺ , –5.5; Ca ²⁺ , –5.2; Sr ²⁺ , –5.5; Ba ²⁺ , –5.4	SSM	0.1	0.1	–	–	25.0 ± 0.5 °C	[24]
Li⁺-115	Li⁺-115 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 23.0 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , –1.35	FIM	–	0.1; H ⁺ , 0.001	53.1 [†] 45.0 ^{††}	–	37 °C; <i>c</i> _{dl} = 10 ^{–4.9} M [†] ; <i>c</i> _{dl} = 10 ^{–2.2} M ^{††}	[13]
Li⁺-116	Li⁺-116 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.6 %), KTpCIPB (<i>x</i> _i = 23.5 %), PVC (<i>w</i> = 32.8 %)	Na ⁺ , –1.14	FIM	–	0.1 H ⁺ , 0.001	60.0 [†] 44.0 ^{††}	–	37 °C; <i>c</i> _{dl} = 10 ^{–5.1} M [†] ; <i>c</i> _{dl} = 10 ^{–2.0} M ^{††}	[13]
Li⁺-117	Li⁺-117 (<i>w</i> = 2.0 %), BBPA (<i>w</i> = 65.6 %), PVC (<i>w</i> = 32.4 %)	Na ⁺ , –1.24; K ⁺ , –1.29; NH ₄ ⁺ , –1.33; Mg ²⁺ , –2.33	SSM	0.01	0.01	56.0	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{–4.32} M; coated glassy carbon electrode	[25]
	Li⁺-117 (<i>w</i> = 1.9 %), BBPA (<i>w</i> = 62.3 %), PVC (<i>w</i> = 30.8 %), poly(3-octylthiophene) (<i>w</i> = 5 %)	Na ⁺ , –1.27; K ⁺ , –1.29; NH ₄ ⁺ , –1.39; Mg ²⁺ , –2.39	SSM	0.01	0.01	56.0	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{–4.41} M; coated glassy carbon electrode	[25]
	Li⁺-117 (<i>w</i> = 1.8 %), BBPA (<i>w</i> = 59.0 %), PVC (<i>w</i> = 29.2 %), poly(3-octylthiophene) (<i>w</i> = 10 %)	Na ⁺ , –1.31; K ⁺ , –1.46; NH ₄ ⁺ , –1.49; Mg ²⁺ , –2.43	SSM	0.01	0.01	56.8	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{–4.23} M; coated glassy carbon electrode	[25]

† in water.

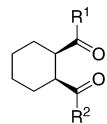
†† in 150 mM NaCl, 1.26 mM CaCl₂, and 4.3 mM KCl.

Table 2: Li⁺-Selective Electrodes (Continued)

ionophore	membrane composition	$\lg K_{Li^+, B^n+}$	method	primary ion conc. (M)	interfering ion conc. (M)	slope (mV/decade)	linear range (M)	remarks	ref.
	Li⁺-117 (<i>w</i> = 1.7 %), BBPA (<i>w</i> = 55.8 %), PVC (<i>w</i> = 27.5 %), poly(3-octylthiophene) (<i>w</i> = 15 %)	Na ⁺ , -1.40; K ⁺ , -1.48; NH ₄ ⁺ , -1.61; Mg ²⁺ , -2.58	SSM	0.01	0.01	57.8	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{-4.26} M; coated glassy carbon electrode	[25]
	Li⁺-117 (<i>w</i> = 1.6 %), BBPA (<i>w</i> = 52.5 %), PVC (<i>w</i> = 25.9 %), poly(3-octylthiophene) (<i>w</i> = 20 %)	Na ⁺ , -1.37; K ⁺ , -1.47; NH ₄ ⁺ , -1.57; Mg ²⁺ , -2.49	SSM	0.01	0.01	55.5	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{-4.20} M; coated glassy carbon electrode	[25]
	Li⁺-117 (<i>w</i> = 1.5 %), BBPA (<i>w</i> = 49.2 %), PVC (<i>w</i> = 24.3 %), poly(3-octylthiophene) (<i>w</i> = 25 %)	Na ⁺ , -1.40; K ⁺ , -1.47; NH ₄ ⁺ , -1.62; Mg ²⁺ , -2.45	SSM	0.01	0.01	56.0	–	23 ± 2 °C; <i>c</i> _{dl} = 10 ^{-4.26} M; coated glassy carbon electrode	[25]
Li⁺-118	Li⁺-118 (<i>w</i> = 1.2 %), oNPOE (<i>w</i> = 65.8 %), PVC (<i>w</i> = 33 %)	Na ⁺ , -0.2; K ⁺ , +1.1; NH ₄ ⁺ , +1.3; Mg ²⁺ , +0.6; Ca ²⁺ , +0.6	MPM	–	$\Delta c_B = 0.1$	6.3	–	artificial serum background; <i>c</i> _{dl} = 10 ^{-3.69} M	[3]

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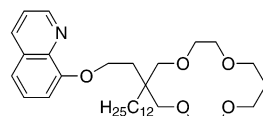
Table 2: Li⁺-Selective Electrodes (*Continued*)

Li⁺-1 (ETH 1630, $M_r = 394.64$): $R^1 = R^2 =$

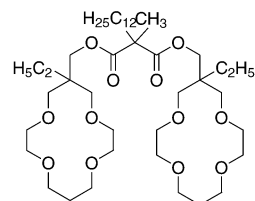
Li⁺-2 (ETH 1644, $M_r = 394.64$): $R^1 = R^2 =$

Li⁺-3 (ETH 1811, $M_r = 498.79$): $R^1 = R^2 =$

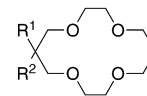
Li⁺-4 (ETH 1810, $M_r = 446.72$): $R^1 =$
 $R^2 =$



Li⁺-16 ($M_r = 543.78$)



Li⁺-20 ($M_r = 775.07$)



Li⁺-5 ($M_r = 372.59$): $R^1 = H$, $R^2 = C_{12}H_{25}$

Li⁺-6 ($M_r = 386.61$): $R^1 = CH_3$, $R^2 = C_{12}H_{25}$

Li⁺-7 ($M_r = 428.69$): $R^1, R^2 = C_8H_{17}$

Li⁺-8 ($M_r = 540.91$): $R^1, R^2 = C_{12}H_{25}$

Li⁺-9 ($M_r = 462.71$): $R^1 = CH_2C_6H_5$, $R^2 = C_{12}H_{25}$

Li⁺-10 ($M_r = 384.51$): $R^1, R^2 = CH_2C_6H_5$

Li⁺-11 ($M_r = 430.67$): $R^1 = CH_2CH_2OCH_3$, $R^2 = C_{12}H_{25}$

Li⁺-12 ($M_r = 474.72$): $R^1 = (OCH_2CH_2)_2CH_3$, $R^2 = C_{12}H_{25}$

Li⁺-13 ($M_r = 506.76$): $R^1 = CH_2CH_2OCH_2C_6H_5$, $R^2 = C_{12}H_{25}$

Li⁺-14 ($M_r = 458.68$): $R^1 = CH_2CH_2OCOCH_3$, $R^2 = C_{12}H_{25}$

Li⁺-15 ($M_r = 552.73$): $R^1 = CH_2CH_2OPO(OC_2H_5)_2$, $R^2 =$

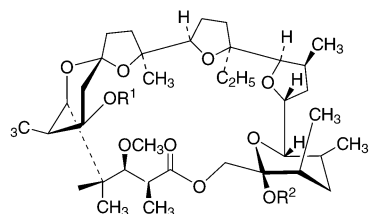
$C_{12}H_{25}$

Li⁺-17 ($M_r = 444.65$): $R^1 = CH_2COOCH_3$, $R^2 = C_{12}H_{25}$

Li⁺-18 ($M_r = 485.75$): $R^1 = CH_2CON(C_2H_5)_2$, $R^2 = C_{12}H_{25}$

Li⁺-19 ($M_r = 488.75$): $R^1, R^2 = CH_2OC_8H_{17}$

Li⁺-95 ($M_r = 455.60$): $R^1 = CH_3$, $R^2 = CH_2CON(CH_2Ph)_2$



Li⁺-21 (macrocyclic monensin, $M_r = 652.86$):

$R^1, R^2 = H$

Li⁺-22 (monensin monoacetate, $M_r = 694.90$):

$R^1 = COCH_3$, $R^2 = H$

Li⁺-41 (monensin diacetate, $M_r = 769.02$):

$R^1, R^2 = COCH_3$

Li⁺-42 (monensin monopropionate, $M_r = 741.01$):

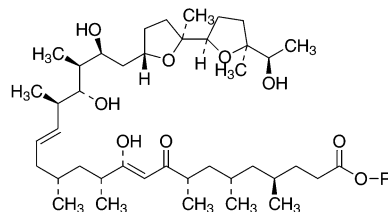
$R^1 = H$, $R^2 = COCH_2CH_3$

Li⁺-43 (monensin monobutyrate, $M_r = 755.04$):

$R^1 = H$, $R^2 = CO(CH_2)_2CH_3$

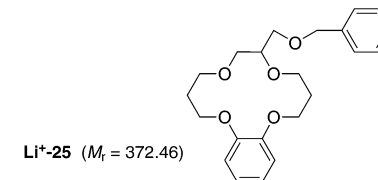
Li⁺-44 (monensin monoisobutyrate, $M_r = 755.04$):

$R^1 = H$, $R^2 = COCH(CH_3)_2$

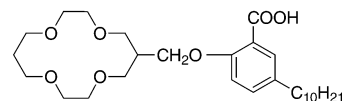


Li⁺-23 ($M_r = 709.01$): $R = H$

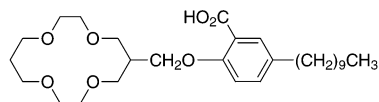
Li⁺-24 ($M_r = 723.04$): $R = CH_3$



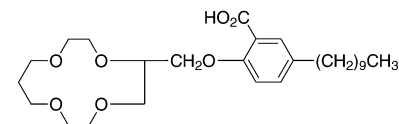
Li⁺-25 ($M_r = 372.46$)



Li⁺-26 ($M_r = 494.67$)

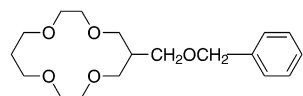


Li⁺-27 ($M_r = 494.67$)

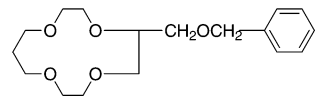


Li⁺-28 ($M_r = 480.64$)

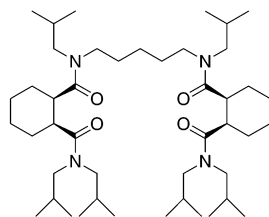
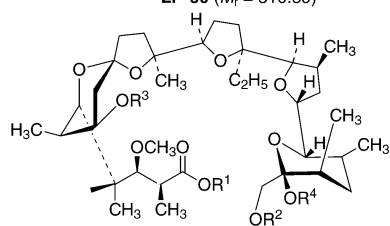
Table 2: Li⁺-Selective Electrodes (*Continued*)



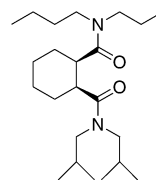
Li⁺-29 ($M_r = 324.42$)



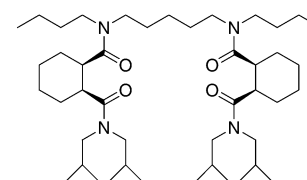
Li⁺-30 ($M_r = 310.39$)



Li⁺-31 (ETH 2177, $M_r = 745.18$)



Li⁺-32 (ETH 2295, $M_r = 380.61$)



Li⁺-33 (ETH 2294, $M_r = 745.18$)

Li⁺-34 (monensin, $M_r = 670.89$): $R^1 = R^2 = R^3 = R^4 = H$

Li⁺-35 (monensin methylester, $M_r = 684.92$): $R^1 = CH_3$, $R^2 = R^3 = R^4 = H$

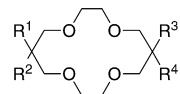
Li⁺-36 ($M_r = 839.21$): $R^1 = C_{12}H_{25}$, $R^2 = R^3 = R^4 = H$

Li⁺-37 ($M_r = 726.95$): $R^1 = CH_3$, $R^2 = COCH_3$, $R^3 = R^4 = H$

Li⁺-38 ($M_r = 768.99$): $R^1 = CH_3$, $R^2 = COCH_3$, $R^3 = COCH_3$, $R^4 = H$

Li⁺-39 ($M_r = 768.99$): $R^1 = CH_3$, $R^2 = COCH_3$, $R^3 = H$, $R^4 = COCH_3$

Li⁺-40 ($M_r = 811.03$): $R^1 = CH_3$, $R^2 = COCH_3$, $R^3 = COCH_3$, $R^4 = COCH_3$



Li⁺-45 ($M_r = 468.68$): $R^1 = CH_2C_6H_4CH(CH_3)_2$, $R^2 = CH_2C_6H_4CH(CH_3)_2$, $R^3 = H$, $R^4 = H$

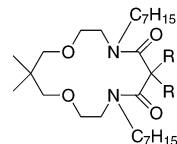
Li⁺-46 ($M_r = 434.57$): $R^1 = CH_2C_6H_5$, $R^2 = CH_2C_{10}H_7$, $R^3 = H$, $R^4 = H$

Li⁺-47 ($M_r = 484.63$): $R^1 = CH_2C_{10}H_7$, $R^2 = CH_2C_{10}H_7$, $R^3 = H$, $R^4 = H$

Li⁺-48 ($M_r = 554.94$): $R^1 = CH_3$, $R^2 = C_{12}H_{25}$, $R^3 = C_{12}H_{25}$, $R^4 = H$

Li⁺-49 ($M_r = 552.84$): $R^1 = CH_2C_6H_5$, $R^2 = CH_2C_6H_5$, $R^3 = C_{12}H_{25}$, $R^4 = H$

Li⁺-50 ($M_r = 566.86$): $R^1 = CH_2C_6H_5$, $R^2 = CH_2C_6H_5$, $R^3 = C_{12}H_{25}$, $R^4 = CH_3$



Li⁺-51 ($M_r = 454.69$): $R = H$

Li⁺-52 ($M_r = 482.75$): $R = CH_3$

Li⁺-53 ($M_r = 634.94$): $R = CH_2C_6H_5$

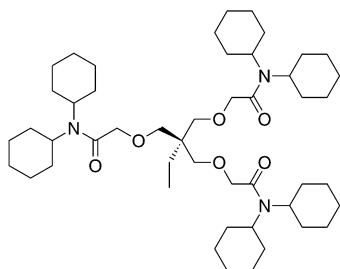
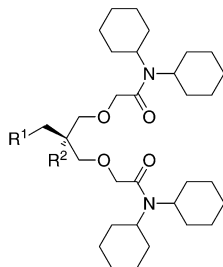
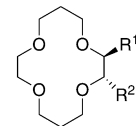
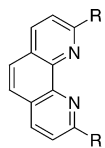
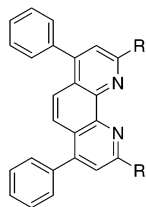
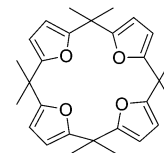
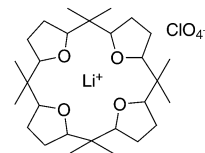
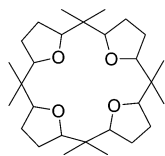
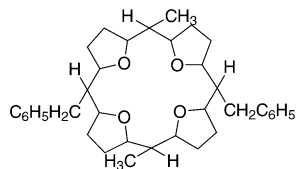
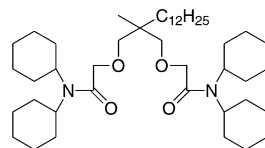
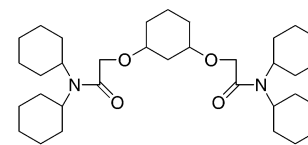
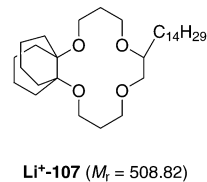
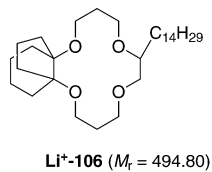
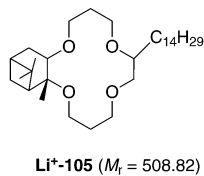
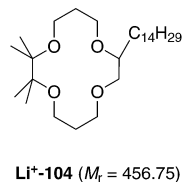
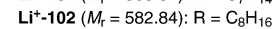
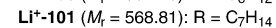
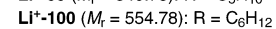
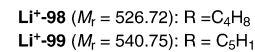
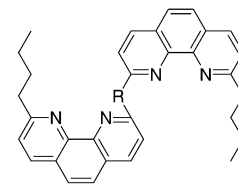
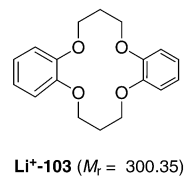
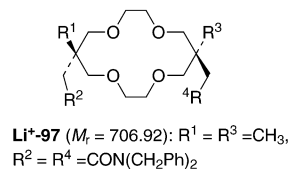
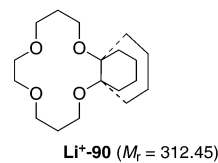
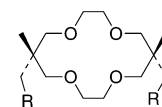
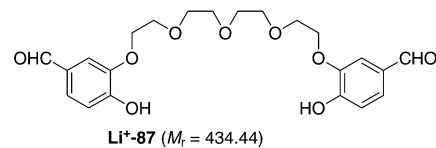
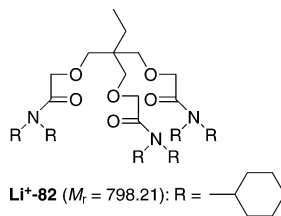
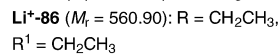
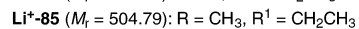
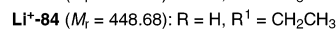
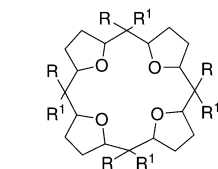
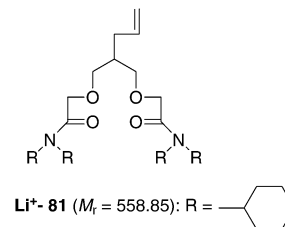
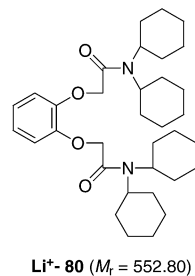
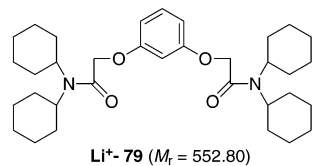
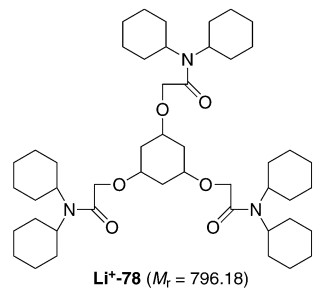
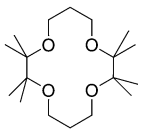
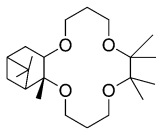
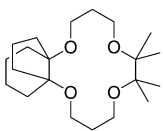
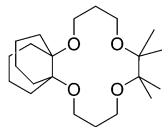
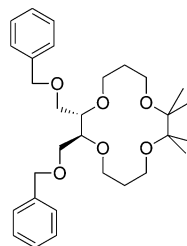
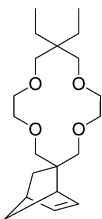
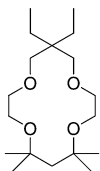
Table 2: Li⁺-Selective Electrodes (*Continued*)**Li*-54** ($M_r = 798.20$)**Li*-55** ($M_r = 558.84$): $R^1 = \text{CHCH}_2$, $R^2 = \text{H}$
Li*-117 (ETH 2137, $M_r = 602.95$):
 $R^1 = (\text{CH}_2)_2\text{CH}_3$, $R^2 = \text{CH}_2\text{CH}_3$ **Li*-56** ($M_r = 444.57$): $R^1 = R^2 = \text{CH}_2\text{OCH}_2\text{Ph}$
Li*-57 ($M_r = 542.80$): $R^1 = R^2 = \text{CH}_2\text{CONBu}_2$
Li*-58 ($M_r = 542.80$): $R^1 = R^2 = \text{CH}_2\text{CON}(\text{sec Bu})_2$
Li*-89 ($M_r = 376.45$): $R^1 = R^2 = \text{CH}_2\text{COOCH}_3$
Li*-91 ($M_r = 514.74$): $R^1 = R^2 = \text{CONBu}_2$
Li*-92 ($M_r = 514.74$): $R^1 = R^2 = \text{CON}(\text{sec Bu})_2$
Li*-93 ($M_r = 650.81$): $R^1 = R^2 = \text{CON}(\text{CH}_2\text{Ph})_2$
Li*-94 ($M_r = 404.50$): $R^1 = R^2 = \text{CO}_2\text{Bu}$
Li*-115 ($M_r = 324.42$): $R^1 = \text{H}$, $R^2 = \text{CH}_2\text{OCH}_2\text{Ph}$
Li*-116 ($M_r = 247.31$): $R^1 = \text{H}$, $R^2 = \text{CH}_2\text{OCH}_3$ **Li*-59** ($M_r = 180.21$): $R = \text{H}$
Li*-61 ($M_r = 208.26$): $R = \text{CH}_3$
Li*-63 ($M_r = 292.42$): $R = (\text{CH}_2)_3\text{CH}_3$
Li*-65 ($M_r = 292.42$): $R = \text{CH}(\text{CH}_3)(\text{C}_2\text{H}_5)$
Li*-67 ($M_r = 292.42$): $R = \text{C}(\text{CH}_3)_3$
Li*-69 ($M_r = 404.64$): $R = (\text{CH}_2)_7\text{CH}_3$
Li*-71 ($M_r = 332.40$): $R = \text{C}_6\text{H}_5$ **Li*-60** ($M_r = 332.40$): $R = \text{H}$
Li*-62 ($M_r = 360.46$): $R = \text{CH}_3$
Li*-64 ($M_r = 444.62$): $R = (\text{CH}_2)_3\text{CH}_3$
Li*-66 ($M_r = 444.62$): $R = \text{CH}(\text{CH}_3)(\text{C}_2\text{H}_5)$
Li*-68 ($M_r = 444.62$): $R = \text{C}(\text{CH}_3)_3$
Li*-70 ($M_r = 558.86$): $R = (\text{CH}_2)_7\text{CH}_3$
Li*-72 ($M_r = 484.60$): $R = \text{C}_6\text{H}_5$ **Li*-73** ($M_r = 432.56$)**Li*-75** ($M_r = 555.07$)**Li*-74** ($M_r = 448.68$)**Li*-118** ($M_r = 544.78$)**Li*-76** ($M_r = 701.13$)**Li*-77** ($M_r = 558.84$)

Table 2: Li⁺-Selective Electrodes (Continued)



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Table 2: Li⁺-Selective Electrodes (*Continued*)**Li⁺-108** ($M_r = 316.48$)**Li⁺-109** ($M_r = 368.56$)**Li⁺-110** ($M_r = 354.53$)**Li⁺-111** ($M_r = 368.56$)**Li⁺-112** ($M_r = 500.67$)**Li⁺-113** ($M_r = 338.49$)**Li⁺-114** ($M_r = 316.48$)