Please enter these **calibration parameters** and the **Lot No.** into the BioLection software!

pH calibration parameters Lot No. 2006322 (BioLector® Pro, filter module ID-424)

Temperature	20°C	21°C	22°C	23°C	24°C	25°C	26°C
ϕ min	71.20	71.27	71.33	71.40	71.47	71.54	71.60
ϕ max	19.27	19.34	19.41	19.47	19.54	19.60	19.67
dpH	-0.42	-0.42	-0.42	-0.41	-0.41	-0.41	-0.41
pH_0	5.30	5.30	5.29	5.29	5.29	5.28	5.28
Temperature	**27°C**	**28°C**	**29°C**	**30°C**	**31°C**	**32°C**	**33°C**
ϕ min	71.67	71.74	71.80	71.87	71.94	72.01	72.07
ϕ max	19.74	19.80	19.87	19.93	20.00	20.07	20.13
dpH	-0.41	-0.41	-0.41	-0.41	-0.41	-0.41	-0.41
pH_0	5.27	5.27	5.27	5.26	5.26	5.25	5.25
Temperature	**34°C**	**35°C**	**36°C**	**37°C**	**38°C**	**39°C**	**40°C**
ϕ min	72.14	72.21	72.27	72.34	72.41	72.48	72.54
ϕ max	20.20	20.27	20.33	20.40	20.46	20.53	20.60
dpH	-0.41	-0.41	-0.41	-0.41	-0.41	-0.40	-0.40
pH_0	5.24	5.24	5.24	5.23	5.23	5.22	5.22

pH sensor properties

Dynamic range	pH 3.65 - 6.55
Resolution	Up to 0.01 pH (software)
Accuracy	± 0.25 pH at pH 4.00 - 4.20; ± 0.1 pH at pH 4.20 – 6.05; ± 0.25 pH at pH 6.05 - 6.20 (batch calibration)
Response time (t90)	At 25 °C < 30 s
Drift at pH = 7	< 0.005 pH per day (sampling interval of 6 min)
Temperature range	15 °C to 40 °C
Compatibility	Aqueous solutions. ethanol. methanol (max. 5 % v/v)
Sensor stability	sensor material can be degraded by some microorganisms
Cross-sensitivity	Reduced to ionic strength (salinity)
Basic material	pH sensor pH51-194150157 (at least stable for 7 days with CertiPUR-buffer) **pH sensors are light-sensitive; please protect them from direct light!**

pH calibration

Buffer	CertiPUR Reference Material Buffer solutions Set (pH 2.00 ± 0.01 / pH 3.00 ± 0.015 / pH 7.00 ± 0.01 / pH 8.00 ± 0.03. 20 °C); 150 mM Citrat-Na-Phosphate buffer (16 solutions)
Settings	BioLector protocol = pH51-RF-calibration. T = 20-40 °C. 800 rpm. 1000 µL/well. shaking diameter 3 mm. MTP-type = Microfluidic Round Plate (MTP-RMF32C-BOH3)
Calibration device	Hardware ID: BL-09-000F-0032
Calibration phase offset	pH -360.25 (pH Ser. 3288. gain 6)
Date of calibration	2020/06/05

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Please enter these **calibration parameters** and the **Lot No.** into the BioLection software!

DO calibration parameters Lot No. 2006322 (BioLector® Pro. filter module ID-228/-428)

Temperature	20°C	21°C	22°C	23°C	24°C	25°C	26°C
ϕ cal0	68.57	68.57	68.57	68.56	68.56	68.56	68.55
ϕ cal100	41.76	41.59	41.41	41.24	41.07	40.90	40.72
Temperature	**27°C**	**28°C**	**29°C**	**30°C**	**31°C**	**32°C**	**33°C**
ϕ cal0	68.55	68.55	68.54	68.54	68.54	68.53	68.53
ϕ cal100	40.55	40.38	40.20	40.03	39.86	39.68	39.51
Temperature	**34°C**	**35°C**	**36°C**	**37°C**	**38°C**	**39°C**	**40°C**
ϕ cal0	68.53	68.52	68.52	68.52	68.51	68.51	68.51
ϕ cal100	39.34	39.17	38.99	38.82	38.65	38.47	38.30

DO sensor properties

Dynamic range	0 - 100 % air saturation (a.s.)
Resolution	Up to 0.1 % O_2 (software)
Accuracy	± 5% dissolved oxygen (batch calibration)
Drift at 0% oxygen	< 0.5% O_2 per day (sampling interval of 6 min)
Response time (t90)	< 30 s
Temperature range	5 – 50°C
Sensor stability	sensor material can be degraded by some microorganisms
Cross-sensitivity to	Organic solvents. such as acetone. toluene. chloroform or methylene chloride. Chlorine gas; high concentration of fluorescent molecules in the visible range can interfere (mCherry. tdTomato. dsRed. nile red); complex media can cause a DO-shift
Basic material	Oxygen sensor RF-m2p-A 200950182 (at least stable for 7 days with CertiPUR-buffer) **DO sensors are light-sensitive; please protect them from direct light!**

DO calibration

Calibration	0.5 M Sulfite system (Two-point calibration with oxygen-free environment (sodium sulfite) and air-saturated environment)
Settings	BioLector protocol = pH51-RF-calibration. T = 20-40 °C. 800 rpm. 1000 µL/well. shaking diameter 3 mm. MTP-type = Microfluidic Round Plate (MTP-RMF32C-BOH3)
Calibration device	Hardware ID: BL-09-000F-0032
Calibration phase offset	DO -360.50 (DO Ser.4302-RD. gain 4)
Date of calibration	2020/06/05

Sterilization procedure

Sterilization	Beta irradiation (20 kGy)
BGS-certificate No	766620
Date of sterilization	2020/05/25

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