

0.1M Phosphate buffer – pH range 5.8 –8.0

Prepare 0.2M solutions of $\text{Na}_2\text{HPO}_4 \cdot 12\text{H}_2\text{O}$ (71.64g/l) and $\text{NaH}_2\text{PO}_4 \cdot 2\text{H}_2\text{O}$ (31.21g/l)

Mix the volumes shown in the table and make the total volume up to 100cm^3 or dissolve the masses indicated in water and make up to 100cm^3

pH at 25 °C	$\text{Na}_2\text{HPO}_4 \cdot 12\text{H}_2\text{O}$		$\text{NaH}_2\text{PO}_4 \cdot 2\text{H}_2\text{O}$	
	Volume of 0.2M solution in 100cm^3 (cm^3)	Mass in 100cm^3 (g)	Volume of 0.2M solution in 100cm^3 (cm^3)	Mass in 100cm^3 (g)
5.8	4.0	0.29	46.0	1.44
6.0	6.15	0.44	43.85	1.37
6.2	9.25	0.66	40.75	1.27
6.4	13.25	0.95	36.75	1.15
6.6	18.75	1.34	31.25	0.98
6.8	24.5	1.76	25.5	0.80
7.0	30.5	2.19	19.5	0.61
7.2	36.0	2.58	14.0	0.44
7.4	40.5	2.90	9.5	0.30
7.6	43.5	3.12	6.5	0.20
7.8	45.75	3.28	4.25	0.13
8.0	47.35	3.39	2.65	0.08

Gomori, after Sørensen, Methods in Enzymology 1, 143 (1955)