

# NS3108: Sensing and Signalling in Biology and Physics

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Alberts, B. (2015). *Molecular biology of the cell (Sixth Edition)* (Sixth edition). Garland Science, Taylor and Francis Group.

Berg, Jeremy M., Tymoczko, John L., & Stryer, Lubert. (2011). *Biochemistry* (7th ed). W. H. Freeman.

<https://bibliu.com/users/saml/samlLeicester?RelayState=eyJjdXN0b21fbGF1bmNoX3VybcI6liMvdmlldy9ib29rcy85NzgxMzE5MjQ4MDYyL2VwdWlvT0VCUFMveGh0bWwvYmVyXzk3ODEzMTkxMTQ2NzFfY29udGVudHMuaHRtbCJ9>

Brooker, Robert J. (2010). *Biology* (2nd ed). McGraw-Hill Higher Education.

Calvo, F., Agudo-Ibáñez, L., & Crespo, P. (2010). The Ras-ERK pathway: Understanding site-specific signaling provides hope of new anti-tumor therapies. *BioEssays*, 32(5), 412-421. <https://doi.org/10.1002/bies.200900155>

Cooper, Geoffrey M. & Hausman, Robert E. (2013). *The cell: a molecular approach* (6th ed). Sinauer Associates.

Endres, Robert G. (2013). *Physical principles in sensing and signaling: with an introduction to modeling in biology*. Oxford University Press.

<http://ezproxy.lib.le.ac.uk/login?url=http://www.myilibrary.com?id=416871>

Extracellular Signalling. (n.d.).

<http://www.sumanasinc.com/webcontent/animations/content/extracellularsignaling.html>

Grant, I.S., & Phillips, W.R. (1990a). Extract from chapter 9 - Transmissions lines. In *Electromagnetism: Vol. The Manchester physics series* (2nd ed). Wiley.

<http://ezproxy.lib.le.ac.uk/login?url=http://lib.myilibrary.com?id=504430>

Grant, I.S., & Phillips, W.R. (1990b). Extracts from Chapter 8 - 8.3 'Impedance and Admittance' to 8.4.1 'Ladder Networks'. In *Electromagnetism: Vol. The Manchester physics series* (2nd ed). Wiley.

<http://ezproxy.lib.le.ac.uk/login?url=http://lib.myilibrary.com?id=504430>

Lemmon, M. A., & Schlessinger, J. (2010). Cell Signaling by Receptor Tyrosine Kinases. *Cell*, 141(7), 1117-1134. <https://doi.org/10.1016/j.cell.2010.06.011>

Lim, W. A. (2010). Designing customized cell signalling circuits. *Nature Reviews Molecular Cell Biology*, 11(6), 393-403. <https://doi.org/10.1038/nrm2904>

Lim, W., Mayer, B., & Pawson, T. (2015). *Cell signaling: principles and mechanisms*. Garland Science.

Liu, B. A., Engelmann, B. W., & Nash, P. D. (2012). The language of SH2 domain interactions defines phosphotyrosine-mediated signal transduction. *FEBS Letters*, 586(17), 2597–2605. <https://doi.org/10.1016/j.febslet.2012.04.054>

Lodish, Harvey F. (2013). *Molecular cell biology* (7th ed). W.H. Freeman.

Marks, F., Müller-Decker, K., & Klingmüller, U. (2009). *Cellular signal processing: an introduction to molecular mechanisms of signal transduction*. Garland Science.

Murray, Robert K. & Harper, Harold A. (2009). *Harper's illustrated biochemistry* (28th ed). McGraw-Hill Medical.  
<https://ebookcentral.proquest.com/lib/leicester/detail.action?docID=4657718>

Nelson, David L., Cox, Michael M., & Lehninger, Albert L. (2013). *Lehninger principles of biochemistry* (6th ed). W.H. Freeman.  
<https://bibliu.com/users/saml/samlLeicester?RelayState=eyJjdXN0b21fbGF1bmNoX3VyYbCl6liMvdmllldy9ib29rcy85NzgxMzE5MTUwODc3L2VwdWlvt0VCUFMveGh0bWwvbmVsXzk3ODE0NjQxODc5NTdfY29udC5odG1sln0%3D>

Nelson, Philip Charles. (2008). *Biological physics: energy, information, life* (Updated ed). W.H. Freeman.

Pathway Central: ERK Signaling. (n.d.).  
[http://www.sabiosciences.com/pathway.php?sn=ERK\\_Signaling](http://www.sabiosciences.com/pathway.php?sn=ERK_Signaling)

Phase velocity - Wikipedia, the free encyclopedia. (n.d.).  
[http://en.wikipedia.org/wiki/Phase\\_velocity](http://en.wikipedia.org/wiki/Phase_velocity)

Raven, Peter H., Johnson, George B., Mason, Kenneth A., Losos, Jonathan B., & Singer, Susan R. (2014). *Biology* (10th ed). McGraw-Hill.

Reece, Jane B. & Campbell, Neil A. (2011). *Biology* (9th ed). Pearson Education.  
[http://le.alma.exlibrisgroup.com/view/action/uresolver.do?operation=resolveService&package\\_service\\_id=5663610340002746&institutionId=2746&customerId=2745](http://le.alma.exlibrisgroup.com/view/action/uresolver.do?operation=resolveService&package_service_id=5663610340002746&institutionId=2746&customerId=2745)

Scott, J. D., & Pawson, T. (2009). Cell Signaling in Space and Time: Where Proteins Come Together and When They're Apart. *Science*, 326(5957), 1220–1224.  
<https://doi.org/10.1126/science.1175668>

Signaling Pathways: MAPK/Erk in Growth and Differentiation. (n.d.).  
[http://www.cellsignal.com/reference/pathway/MAPK\\_ERK\\_Growth.html](http://www.cellsignal.com/reference/pathway/MAPK_ERK_Growth.html)

Tipler, Paul A. & Mosca, Gene P. (2008). *Physics for scientists and engineers: with modern physics* (6th ed). W.H. Freeman.  
<https://bibliu.com/app/#/view/books/9781319155988/pdf2htmllex/index.html>