

Bibliographie

- [1] Abdi, H. (1987). *Introduction au traitement statistique des données expérimentales*. Grenoble : PUG.
- [2] Abdi, H. (1988). A generalized approach for connectionist auto-associative memories : interpretation, implications and illustration for face processing. In J. Demongeot (Ed.), *Artificial Intelligence and Cognitive Sciences*. Manchester : Manchester University Press.
- [3] Abdi, H. (1994a). *Les réseaux de neurones*. Grenoble, France : PUG.
- [4] Abdi, H. (1994b). A neural network primer. *Journal of Biological Systems*, **2**, 247–281.
- [5] Abdi H. (2001). Linear algebra for neural networks. In N.J. Smelser, P.B. Baltes (Eds.) : *International Encyclopedia of the Social and Behavioral Sciences*. Oxford (UK) : Elsevier
- [6] Abdi, H. (2003a). Partial least squares regression (PLS-regression). In M. Lewis-Beck, A. Bryman, T. Futing (Eds) : *Encyclopedia for research methods for the social sciences*. Thousand Oaks (CA) : Sage.
- [7] Abdi, H. (2003b). Multivariate analysis. In M. Lewis-Beck, A. Bryman, & T. Futing (Eds) : *Encyclopedia for research methods for the social sciences*. Thousand Oaks (CA) : Sage.
- [8] Abdi, H., & Valentin, D. (1994). Modèles numériques, statistiques et neuronaux de la reconnaissance des visages. *Psychologie Française*, **39**, 375-391.
- [9] Abdi, H., Valentin, D., & Edelman, B. (1999). *Neural networks*. Thousand Oak, CA : Sage.
- [10] Abdi, H., Valentin, D., Edelman, B., & O'Toole A.J. (1995). More about the difference between men and women : Evidence from linear neural networks and the principal component approach. *Perception*, **24**, 539-562.
- [11] Abdi, H., Valentin, D., O'Toole A.J., & Edelman, B. (2005). DISTATIS : The analysis of multiple distance matrices. *Proceedings of the IEEE Computer Society : International Conference on Computer Vision and Pattern Recognition*. (San Diego, CA, USA).

- [12] Anderson J.A., & Rosenfeld, E. (1998). *Talking nets*. Cambridge : MIT Press.
- [13] Anton, H., & Bushby R.C. (2002). *Contemporary linear algebra*. New York : Wiley.
- [14] Axler S. (1997). *Linear algebra done right*. New York : Springer Verlag
- [15] Ballard, D. H. (1997). *An introduction to natural computation*. Cambridge, MA : MIT Press.
- [16] Barnett, S. (1990). *Matrices : Theory and applications*. Oxford : Oxford University Press.
- [17] Barrett, H.H., & Myers, K.J. (2004). *Foundations of image science*. New York : Wiley
- [18] Barthélemy, J.P., & Guénoche, A. (1989). *Les Arbres et les représentations de proximité*. Paris : Masson.
- [19] Benzécri, J.P. (1973). *L'analyse des données (2 vol.)*. Paris : Dunod
- [20] Benzécri, J.P. (1982). *Histoire et préhistoire de l'analyse des données (2 vol.)*. Paris : Dunod
- [21] Bishop, C.M. (1995). *Neural networks for pattern recognition*. Oxford, UK : Oxford University Press.
- [22] Borg I., & Groenen P. (1997). *Modern multidimensional scaling*. New York : Springer Verlag.
- [23] Borsellino A., & Poggio, T. (1973). Convolution and correlation algebras. *Kibernetik*, **122**, 113–122.
- [24] Bracewell, R.N. (1999). *The Fourier transform and its applications*. New York : McGraw-Hill.
- [25] Brigham, E.O. (1974). *The fast Fourier transform*. New York : Prentice-Hall.
- [26] Bruce, V., Healey, P., Burton, A., Doyle, T., Coombes, A. & Linney, A. (1991). Recognising facial surface. *Perception*, **20**, 755–69.
- [27] Brunet, E. (1989). Faut-il pondérer les données linguistiques. *CUMFID*, **16**, 39–50.
- [28] Burke-Hubbard, B. (1995). *Ondes et ondelettes : La saga d'un outil mathématique*. Paris : Belin.
- [29] Ciarlet, P.G., (1989). *Introduction to numerical linear algebra and optimisation*. Cambridge : C.U.P.
- [30] Cooley, J.W., & Tukey, J.W. (1965). An algorithm for the machine calculation of complex Fourier series. *Mathematical Computations*, **19**, 297–301.
- [31] Craw, I. (1995). A manifold model of face and object recognition. In T. Valentine (ed.) *Cognitive and computational aspects of face recognition*. London : Routledge.
- [32] Christensen, R. (1996). *Plane answer to complex questions*. New York : Springer Verlag

- [33] Dacremont, C. (1995). Spectral composition of eating sounds generated by crispy, crunchy and crackly foods. *Journal of Texture Studies*, **26**, 27–43.
- [34] Devous M.D. (2002). SPECT functional data imaging. In A.W Toga, & J.C. Mazziotta (Eds.), *Brain mapping : The methods*. New York : Academic Press. (pp. 513–536).
- [35] Diamantaras, K.i., & Kung, S. Y. (1996). *Principal component neural networks*. New York : Wiley.
- [36] Dhombres, J., & Robert J.-B. (1998). *Fourier : Créateur de la physique mathématique*. Paris : Belin.
- [37] Dreyfus, G., Martinez, J.M., Samuelides, M., Gordon, M.B., Badran, F., Thiria, S., & Héroult, L. (2004). *Les réseaux de neurones : Méthodologie et applications*. Paris : Eyrolles.
- [38] Duda, R., Hart, P., & Stork, D.G. (2001). *Pattern classification*. New York : Wiley.
- [39] Dwyer, P.S. (1967). Some applications of Symbolic matrix derivatives. *Journal of the American Statistical Association*, **62**, 607–625.
- [40] Dwyer, P.S., & MacPhail, M.S. (1948). Symbolic matrix derivatives. *Annals of Mathematical Statistics*, **19**, 517–534.
- [41] Ellacott, E., & Bose, D. (1996). *Neural networks : Deterministic methods of analysis*. London : ITC.
- [42] Escofier, B. (1978). Analyse factorielle et distances répondant au principe d'équivalence distributionnelle. *Revue de Statistique Appliquée*, **26**, 29–37.
- [43] Escofier, B., & Pagès, J. (1998). *Analyses factorielles simples et multiples*. Paris : Dunod.
- [44] Fletcher, R. (1987). *Practical methods of optimization*. New York : Wiley.
- [45] Geladi, P., & Grahn H. (1996). *Multivariate image analysis*. London : Wiley.
- [46] Gill, P.E., Murray, W., & Wright, M. (1991). *Numerical linear algebra and optimization (vol.1)*. Redwood : Addison-Wesley.
- [47] Golub, G.H., & Van Loan, C.F. (1989). *Matrix computations*. Baltimore : John Hopkins University Press.
- [48] Golub, G.H., & Van Loan, C.F. (1991). *Topics in matrix computations*. Baltimore : John Hopkins University Pres
- [49] Gower, J.C., & Dijksterhuis, G.B. (2004). *Procrustes problems*. Oxford : Oxford University Press.
- [50] Grattan-Guinness, I. (1997). *The Rainbow of Mathematics*. New York : Norton.
- [51] Grattan-Guinness, I. (1972). *Joseph Fourier, 1768–1830..* New York : Norton.
- [52] Graybill, F.A. (1983). *Matrices with application to statistics*. Belmont : Wadsworth.

- [53] Green, P.E., & Carroll J.D. (1976). *Mathematical tools for applied multivariate analysis*. New York : Academic Press.
- [54] Greenacre, M.J. (1984). *Theory and applications of correspondence analysis*. London : Academic Press.
- [55] Hagan, M. T., Demuth, . B., & Beale, M. (1996). *Neural networks design*. Boston : PWS.
- [56] Haley, R.W., Kurt, T.L., & Hom, J. (1997). Is there a Gulf War syndrome ? Searching for syndromes by factor analysis of symptoms. *The Journal of the American Medical Association*, **277**, 215–222.
- [57] Hagan, M. T., Demuth, H. B., & Beale, M. (1996). *Neural networks design*. Boston : PWS.
- [58] Hastie, T., Tibshirani, R., & Friedman J. (2002). *The elements of statistical learning*. New York : Springer Verlag
- [59] Hancock, P., Bruce, V., & Burton, A. (1997). Testing principal component representations for faces. In D. Glasspool & G. Houghton (Eds.), *Proceedings of 4th Neural Computation and Psychology Workshop*. London : Springer-Verlag.
- [60] Hanselman, D.C., Littlefield, B.L. (2004). *Mastering MATLAB 7*. New York : Prentice-Hall.
- [61] Harville, D.A. (1998). *Matrix algebra from a statistician's perspective*. New York : Springer-Verlag.
- [62] Haykin, S. (1999). *Neural networks : A comprehensive foundation* (2nd ed). New York : Prentice Hall.
- [63] Healy, M.J.R. (1986). *Matrices for statistics*. Oxford : Oxford University Press.
- [64] Hebb, D. (1949). *The organization of behavior*. New York : Wiley.
- [65] Hecht-Nielsen, R. (1990). *Neurocomputing*. Reading : Addison-Wesley.
- [66] Henderson H.V., & Searle, S.R. (1981). The vec-permutation matrix, the vec-operator and kronecker products : a review. *Linear and Multilinear Algebra*, **9**, 271–288.
- [67] Hefferon J. (2003). *Linear algebra*. Colchester (VM) : Author. Available from : <http://joshua.smcvt.edu/linalg.html>.
- [68] Herivel, J. (1975). *Joseph Fourier. The man and the physicist*. Oxford : Oxford University Press.
- [69] Horn, R.A., & Johnson, C.R. (1985). *Matrix analysis*. Cambridge : C.U.P.
- [70] Horn, R.A., & Johnson C.R. (1991). *Matrix analysis*. Cambridge : MIT Press.
- [71] Hotelling, H. (1933). Analysis of a complex of statistical variables into principal components. *Journal of Educational Psychology*, **24**, 417–441, 498–520.

- [72] James, I. (2003). *Remarkable mathematicians : from Euler to von Neumann*. Cambridge : Cambridge University Press.
- [73] Kirby, M. (2000). *Geometric data analysis*. New York : Wiley.
- [74] Krzanowski, W.J. (1988). *Principles of multivariate analysis*. Oxford : Clarendon Press.
- [75] Labbé C., & Labbé D. (2001). Intertextual distance and authorship attribution : Corneille et Molière. *Journal of Quantitative Linguistics*, **8**, 213–231.
- [76] Lancaster, P., & Tismenetsky, M. (1985). *The theory of matrices*. New York : Academic Press.
- [77] Lapresté, J.T. (1999). *Introduction à MATLAB*. Paris : Ellipses.
- [78] Lebart, L., & Fénelon, J.P. (1971). *Statistiques et informatique appliquées*. Paris : Dunod.
- [79] Leroux B., & Rouanet, H. (2004). *Geometric data analysis : From correspondence analysis to structured data analysis*. New York : Kluwer.
- [80] Lex College (1995). *Who is Fourier ?* Tokyo : Language Research Foundation.
- [81] Luenberger, D.G. (1979). *Introduction to dynamic systems*. New York : Wiley.
- [82] Lunneborg C.E., & Abbott R.D. (1983). *Elementary multivariate analysis for the Behavioral Sciences : Applications of basic structure*. New York : North-Holland.
- [83] Lütkepohl, H. (1996). *Handbook of matrices*. London : Wiley.
- [84] McClelland, J. & Rumelhart, D. (1986). *Parallel distributed processing : Explorations in the microstructure of cognition*. (MIT Press : Cambridge).
- [85] McCulloch, W. S., & Pitts, W. (1943). A logical calculus of the ideas immanent in nervous activity. *Bulletin of Mathematical Biophysics*, **5**, 115–133.
- [86] Magnus, J.R., & Neudecker, H. (1989). *Matrix differential calculus with applications in statistics and econometrics*. New York : Wiley.
- [87] Mardia, K.V., Kent, J.T., & Bibby, J.M. (1979). *Multivariate analysis*. New York : Academic Press.
- [88] Mardsen, J.E., & Tromba, A.J. (1988). *Vector calculus*. San Francisco : Freeman.
- [89] Marr D. (1982). *Vision*. San Francisco : Freeman.
- [90] Marr, D., & Hilbert, E. (1980). Theory of edge detection. *Proceeding of the Royal Society B*, **207**, 187-217.
- [91] Metcalfe J. (1990). Composite holographic associative recall model (CHARM) and blended memories in eyewitness testimony. *Journal of Experimental Psychology : General*. **119**, 145–160.

- [92] Mokhtari, M. (1997). *Apprendre et maîtriser MATLAB*. Paris : Springer-Verlag.
- [93] Murdock, B.B. (1979). Convolution and correlation in perception and memory. In L.G. Nilsson (Ed.) *Perspectives in memory research*. Hillsdale : Elrbaum.
- [94] Murdock, B.B. (1982). A theory for the storage and retrieval of item and associative information. *Psychological Review*, **89**, 609–626.
- [95] Murdock, B.B. (1983). A distributed memory model for serial-order information. *Psychological Review*, **90**, 316–338.
- [96] Murdock, B.B. (1993). TODAM2 : a model for the storage and retrieval of item, associative, and serial-order information. *Psychological Review*, **100**, 183–203.
- [97] Murdock, B.B. (1995). Developing TODAM : three models for serial-order information. *Memory & Cognition*, **23**, 631–645.
- [98] Noble, B., & Daniel, J.W. (1988). *Applied linear algebra*. Englewood Cliffs : Prentice-Hall.
- [99] O'Connor, J.J., & Robertson E.F. (1998). History topic : Matrices and determinants. *MacTutor history of mathematics*. Retrieved from www-history.mcs.st-andrews.ac.uk/HistTopics/Matrices_and_determinants.html.
- [100] O'Toole, A.J., Jiang, F., Abdi, H., & Haxby, J.V. (2005). Partially distributed representations of objects and faces in ventral temporal cortex. *Journal of Cognitive Neuroscience*, **17**, 580–590.
- [101] O'Toole, A.J., Vetter, T., & Troje, N., & Bühlhoff (1997). Sex classification is better with three-dimensional structure than image intensity information. *Perception*, **26**, 75–84.
- [102] Ortega, J.A. (1987). *Matrix theory*. New York : Plenum.
- [103] Parlet, B.E. (1980). *The symmetric eigenvalue problem*. Englewood Cliffs : Prentice Hall.
- [104] Pentland, A., Picard, R. & Sclaroff, S. (1994b). Photobook : Content-based manipulation of image databases. In *SPIE storage and retrieval image and video databases II*, (San Jose), Vol. **2185**.
- [105] Pearson, K. (1901). On lines and planes of closest fit to systems of points in space. *Philosophical Magazine*, **6**, 559–572.
- [106] Personnaz, L, & Rivals, I. (2003). *Réseaux de neurones formels pour la modélisation, la classification et la commande*. Paris : CNRS.
- [107] Pierre, D.A. (1969). *Optimization theory with applications*. New York : Wiley.
- [108] Reed, R.R., & Marks R.J. (1999). *Neural smithing*. Cambridge, MA : MIT press.

- [109] Ripley, B.D. (1996). *Pattern recognition and neural networks*. Cambridge, MA : Cambridge University Press.
- [110] Rojas, R. (1996). *Neural networks*. New York : Springer-Verlag.
- [111] Rosenblatt, F. (1957). The perceptron : a perceiving and recognizing automation (projet PARA), Cornell Aeronautical Laboratory Report, 85-460-1.
- [112] Rosenblatt, F. (1958). The perceptron : a probabilistic model for information storage and organisation in the brain. *Psychological Review*, **65**, 386-408.
- [113] Rosenblatt, F. (1961). *Principles of neurodynamics*. Washington, DC : Spartan Books.
- [114] Rumelhart, D., & McClelland, J. (1986). *Parallel distributed processing : Explorations in the microstructure of cognition*. Cambridge, MA : MIT Press.
- [115] Saville D.J., & Wood, G.R. (1991). *Statistical Method : The geometric approach*. New York : Springer Verlag
- [116] Searle, S. R. (1982). *Matrix algebra useful for statistics*. New York : Wiley.
- [117] Searle S.R., & Willett, L.S. (2001). *Matrix algebra for applied economics*. New York : Wiley.
- [118] Smith, J.O. (2003). *Mathematics of the discrete Fourier transform*. Standford : W3K Press.
- [119] Spivak, M. (1994). *Calculus*. Houston : Publish or Perish Press.
- [120] Stephenson, G. (1974). *An introduction to matrices, sets and groups for science students*. New York : Dover.
- [121] Strang, G. (2004). *An introduction to linear algebra*. Cambridge : Wellesley-press.
- [122] Sundarajan, D. (2001). *The discrete Fourier transform*. Singapour : World Scientific.
- [123] Tatsuoka, M.M. (1971). *Multivariate Analysis*. New York : Wiley.
- [124] Tiberghien, G., Abdi, H., Descles, J.P., Georgieff, N., Jeannerod, M., LeNy, J.F., Livet, P., Pynte, J., & Sabah, G. (2002). *Dictionnaire des sciences cognitives*. Paris : Armand Colin.
- [125] Turk, M., & Pentland, A. (1991). Eigenfaces for recognition, *Journal of Cognitive Neurosciences* **3**, 71–86.
- [126] Valentin, D., Abdi, H., O'Toole, A.J., & Cottrell G. (1994). Connectionist models of face processing : A survey. *Pattern Recognition*, **27**, 1208-1230.
- [127] de Valois, K.K., & de Valois, R. (1997). *Spatial vision*. Oxford : Oxford University Press.
- [128] Widrow, B., & Stearns, S. (1985). *Adaptive signal processing*. New York : Prentice-Hall.

- [129] Widrow, B., & Hoff, M.E. (1960). Adaptative switching circuits. *1960 IRE WESCON Convention Records*, 96–104.
- [130] Wiener, W. (1933). *The Fourier integral, and certain of its applications*. Cambridge : Cambridge University Press,
- [131] Wilkinson, J.H. (1965). *The algebraic eigenvalue problem*. Oxford : Clarendon Press.