

บรรณานุกรม

- [1] S. X. Wang and A. M. Taratorin, *Magnetic information storage technology*. San Diego: Academic Press, 1999.
- [2] B. Sklar, *Digital communications: fundamentals and applications*: Prentice Hall, 2nd-edition, 2001.
- [3] A. M. Taratorin, *Magnetic recording systems and measurements*: Guzik Technical Enterprises, 2004.
- [4] J. W. M. Bergmans, *Digital baseband transmission and recording*. Boston/London/Dordrecht: Kluwer Academic Publishers, 1996.
- [5] T. Suzuki, “Perpendicular magnetic recording: Its basics and potential for the future,” *IEEE Trans. on Magnetics*, vol. MAG-20, no. 5, pp. 675 – 680, September 1984.
- [6] J. Moon, “The role of signal processing in data-storage,” *IEEE Signal Processing Magazine*, pp. 54 – 72, July 1998.
- [7] S. B. Wicker, *Error control systems for digital communication and storage*. New Jersey: Printice Hall International, 1995.
- [8] B. Vasic and E. M. Kurtas, *Coding and signal processing for magnetic recording systems*. New York: CRC Press, 2005.

- [9] K. A. S Immink, "Runlength-limited sequences," in *Proc. of the IEEE*, vol. 78, no. 11, pp. 1745 – 1759, November 1990.
- [10] ปิยะ โควินท์ทวีวัฒน์, *การประมวลผลสัญญาณสำหรับการจัดเก็บข้อมูลดิจิทัล เล่ม 1: พื้นฐานช่องสัญญาณอ่าน-เขียน*, ศูนย์เทคโนโลยีอิเล็กทรอนิกส์และคอมพิวเตอร์แห่งชาติ (เนคเทค), 2550.
- [11] T. A. Roscamp, E. D. Boerner, and G. J. Parker, "Three-dimensional modeling of perpendicular recording with soft underlayer," *J. of Applied Physics*, vol. 91, no. 10, May 2002.
- [12] A. V. Oppenheim, A. S. Willsky, and S. H. Nawab, *Signals and systems*. New Jersey: Prentice Hall, 2nd-edition, 1997.
- [13] Available online at <http://www.mathworks.com>
- [14] ปิยะ โควินท์ทวีวัฒน์, *คู่มือโปรแกรมภาษา SCILAB สำหรับผู้เริ่มต้น* (พิมพ์ครั้งที่ 2), ศูนย์ผลิตตำราเรียน, สถาบันเทคโนโลยีพระจอมเกล้าพระนครเหนือ, 2549.
- [15] G. D. Forney, "Maximum-likelihood sequence estimation of digital sequences in the presence of intersymbol interference," *IEEE Trans. on Information Theory*, vol. IT-18, no. 3, pp. 363 – 378, May 1972.
- [16] J. R. Barry, E. A. Lee, and D. G. Messerschmitt, *Digital communication*. Boston: Kluwer Academic Publishers, 3rd-edition, 2003.
- [17] H. K. Thapar and A. M. Patel, "A class of partial response systems for increasing storage density in magnetic recording," *IEEE Trans. on Magnetics*, vol. 23, no. 5, pp. 3666 – 3668, September 1987.

- [18] P. Kovintavewat, I. Ozgunes, E. Kurtas, J. R. Barry, and S. W. McLaughlin, "Generalized partial response targets for perpendicular recording with jitter noise," *IEEE Trans. on Magnetics*, vol. 38, no. 5, pp. 2340 – 2342, September 2002.
- [19] J. Moon and W. Zeng, "Equalization for maximum likelihood detector," *IEEE Trans. on Magnetics*, vol. 31, no. 2, pp. 1083 – 1088, March 1995.
- [20] S. Raghaven and H. K. Thapar, "Feed-forward timing recovery for digital magnetic recording," in *Proc. of ICC'91*, vol. 2, pp. 794 – 798, June 1991.
- [21] A. N. D' Andrea, U. Mengali, and G. M. Vitetta, "Approximate ML decoding of coded PSK with no explicit carrier phase reference," *IEEE Trans. on Communication*, vol. 42, no. 2/3/4, pp. 1033 – 1039, Feb/Mar/Apr 1994.
- [22] U. Mengali and A. N. D' Andrea, "*Synchronization techniques for digital receivers*," New York: Plenum Press, 1997.
- [23] J. Moon and L. R. Carley, "Performance comparison of detection methods in magnetic recording," *IEEE Trans. on Magnetics*, vol. 26, pp. 3155 – 3172, November 1990.
- [24] K. H. Mueller and M. Müller, "Timing recovery in digital synchronous data receivers," *IEEE Trans. on Communication*, vol. COM-24, no. 5, pp. 516 – 531, May 1976.
- [25] M. H. Hayes, *Statistical digital signal processing and modeling*. John Wiley & Sons Inc., New York, 1996.
- [26] A. Leon-Garcia, *Probability and random processes for electrical engineering*. New York: Addison-Wesley Inc., 2nd-edition, 1994.
- [27] R. D. Cideciyan, F. Dolivo, R. Hermann, W. Hirt, and W. Schott, "A PRML system for digital magnetic recording," *IEEE J. Selected Areas Commun.*, vol. 10, no. 1, pp. 38 – 56, January 1992.

- [28] H. Shafiee, "Timing recovery for sampling detectors in digital magnetic recording," in *Proc. of ICC'96*, vol. 1, pp. 577 – 581, January 1996.
- [29] A. R. Nayak, "Iterative timing recovery for magnetic recording channels with low signal-to-noise ratio," Ph.D. dissertation, Georgia Institute of Technology, Georgia, June 2004.
- [30] P. Kovintavewat, "Timing recovery based-on per-survivor processing," Ph.D. dissertation, Georgia Institute of Technology, Georgia, October 2004.
- [31] J. R. Barry, A. Kavčić, S. W. McLaughlin, and A. R. Nayak, "Iterative timing recovery," *IEEE Signal Processing Magazine*, vol. 21, pp. 89 – 102, January 2004.
- [32] X. Jin and A. Kavčić, "Cycle-slip detection using soft-output information," in *Proc. of ICC'01*, vol. 9, pp. 2706 – 2710, June 2001.
- [33] A. R. Nayak, J. R. Barry, and S. W. McLaughlin, "Joint timing recovery and turbo equalization for coded partial response channels," *IEEE Trans. on Magnetics*, vol. 38, no. 5, pp. 2295 – 2297, September 2003.
- [34] F. M. Gardner, "Interpolation in digital modems — Part I: Fundamentals," *IEEE Trans. on Communication*, vol. 41, no. 3, pp. 501 – 507, March 1993.
- [35] L. Erup, F. M. Gardner, and R. A. Harris, "Interpolation in digital modems — Part II: Implementation and performance," *IEEE Trans. on Communication*, vol. 41, no. 6, pp. 998 – 1008, June 1993.
- [36] Z. Wu, J. M. Cioffi, and K. D. Fisher "A MMSE interpolated timing recovery scheme for the magnetic recording channel," in *Proc. of ICC'97*, vol. 3, pp. 1625 – 1629, 1997.

- [37] M. Spurbeck and R. T. Behrens, "Interpolated timing recovery for hard disk drive read channels," in *Proc. of ICC'97*, vol. 3, pp. 1618 – 1624, 1997.
- [38] P. Kovintavewat, J. R. Barry, F. M. Erden, and E. M. Kurtas, "Per-survivor timing recovery for uncoded partial response channels," in *Proc. of ICC'04*, Paris, France, vol. 5, pp. 2715 – 2719, June 20 – 24, 2004.
- [39] P. Kovintavewat, J. R. Barry, F. M. Erden, and E. M. Kurtas, "Per-survivor iterative timing recovery for coded partial response channels," in *Proc. of Globecom'04*, Texas, USA, vol. 4, pp. 2604 – 2608, Nov 29 – Dec 3, 2004.
- [40] P. Kovintavewat, J. R. Barry, M. F. Erden, and E. M. Kurtas, "Robustness of Per-Survivor Iterative Timing Recovery in Perpendicular Recording Channels," *IEEE International Conference on Magnetism (INTERMAG 2005)*, Nagoya, Japan, pp. 1613 – 1614, April 4 – 8, 2005.
- [41] D. G. Messerschmitt, "Design of finite impulse response for the Viterbi algorithm and decision-feedback equalizer," in *Proc. of ICC'74*, pp. 37D-1-5, June 1974.
- [42] J. Fitzpatrick, J. K. Wolf, and L. Barbosa, "New equalizer targets for sampled magnetic recording system," in *Proc. of the 25th Asilomar Conference on Signals Systems and Computers*, pp. 30 – 34, November 1991.
- [43] T. Oenning and J. Moon, "Partial response maximum likelihood detection for perpendicular recording," *IEEE International Conference on Magnetism (INTERMAG 2000)*, p. HT-08, 2000.
- [44] I. Lee, C. Modlin, and J. M. Cioffi, "Equalized maximum likelihood receiver in a magnetic recording channel," in *Proc. of ICC'93*, pp. 1970 – 1973, November 1993.

- [45] C. T. Beare, "The choice of the desired impulse response in combined linear-Viterbi algorithm equalizers," *IEEE Trans. on Communication*, vol. COM-26, no. 8, pp. 1301 – 1307, August 1978.
- [46] I. Lee and J. M. Cioffi, "Equalized maximum likelihood receiver with a unit energy constraint," *IEEE Trans. on Magnetics*, vol. 33, no. 1, pp. 855 – 862, January 1997.
- [47] A. Ghayeb and W. E. Ryan, "Precoder design for concatenating convolutional codes with generalized partial response channels," in *Proc. of Globecom'00*, San Francisco, CA, 2000, pp. 1859 – 1864.
- [48] L. C. Barbosa, "Maximum likelihood sequence estimators: a geometric view," *IEEE Trans. on Information Theory*, vol. 35, no. 2, pp. 419 – 427, March 1989.
- [49] J. Caroselli and J. K. Wolf, "Error event characterization of partial response systems in magnetic recording systems with medium noise," in *Proc. of Globecom'98*, vol. 5, pp. 2724 – 2728.
- [50] B. E. Moision, P. H. Siegel, and E. Soljanin, "Distance-enhancing for digital recording," *IEEE Trans. on Magnetics*, vol. 34, no. 1, pp. 68 – 74, January 1998.
- [51] P. R. Chevillat, E. Eleftheriou, and D. Maiwald, "Noise-predictive partial-response equalizers and applications," in *Proc. of ICC'92*, vol. 2, pp. 942 – 947, June 1992.
- [52] E. Eleftheriou and W. Hirt, "Noise-predictive maximum-likelihood (NPML) detection for the magnetic recording channel," in *Proc. of ICC'96*, vol. 1, pp. 556 – 560, June 1996.
- [53] S. Altekar, "*Detection and coding techniques for magnetic recording channels*," Ph.D. dissertation, Univ. Calif. San Diego, June 1997.

- [54] J. Moon and J. Park, "Pattern-dependent noise prediction in signal-dependent noise," *IEEE J. Selected Areas Comm.*, vol. 19, no. 4, pp. 730 – 743, June 2001.
- [55] J. Caroselli, S. A. Altekar, P. McEwen, and J. K. Wolf, "Improved detection for magnetic recording systems with media noise," *IEEE Trans. on Magnetics*, vol. 33, no. 5, pp. 2779 – 2781, 1997.
- [56] X. Yang and E. Kurtas, "Noise predictive equalization and detection," *Internal report*, Channels Department, Seagate Technology, Pittsburgh, PA, May 2003.
- [57] R. Raheli, A. Polydoros, and C. K. Tzou, "Per-survivor processing: a general approach to MLSE in uncertain environments," *IEEE Trans. on Commun.*, vol. 43, no. 2, pp. 354 – 364, Feb./Mar./Apr. 1995.
- [58] C. E. Shannon, "A mathematical theory of communication," *The Bell system technical journal*, vol. 27, pp. 379 – 423, 623 – 656, July, October, 1948.
- [59] P. H. Siegel and J. K. Wolf, "Modulation and coding for information storage," *IEEE Communications Magazine*, pp. 68 – 86, December 1991.
- [60] K. A. S. Abdel-Ghaffar and J. H. Weber, "Constrained block codes for class-IV partial-response channels with maximum-likelihood sequence estimation," *IEEE Trans. on Information Theory*, vol. 42, no. 5, pp. 1405 – 1424, September 1996.