

Scientific Instrument Commission Bibliography 19

Nineteenth bibliography of books, pamphlets, catalogues and articles on or connected with historical scientific instruments - Autumn 2002.

This bibliography contains work published in 2002, which came to the compiler's notice before 3rd October 2002. It also contains earlier publications which came to his notice after completing the eighteenth bibliography in Spring 2002. Publications, or notices of publication (please with ISBN) for forthcoming bibliographies may be sent to the compiler:

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Members of the scientific instrument community are invited to send recent titles, especially of publications that may easily escape the compiler's notice, such as descriptive catalogues, exhibition catalogues and papers published in less widely known journals. To avoid duplication, please note that the compiler peruses some forty journals for relevant titles. These range from journals that focus entirely on historic instrumentation, such as the *Bulletin of the Scientific Instrument Society*, *Rittenhouse*, *Journal of the Antique Telescope Society* and *Equilibrium*, to more general journals on the history of science, technology and culture. A list of these journals is found in previous bibliographies.

BEAUCHAMP, Ken, *History of Telegraphy*. IEE History of Technology Series 26 (London, 2001), 413 pages, ISBN 0 85296 792 6. [With an important part dedicated to telegraphic and electrical instruments, apparatus and measuring methods]

BECKMANN, Olof, 'Samuel Klingenstierna and the Achromatic Lens. Part 1: Correspondence with John Dollond', *Journal of the Antique Telescope Society* 22 (2002), 9-15.

BELLOSTA, H el ene, 'Burning Instruments: From Diocles to Ibn Sahl', *Arabic Sciences and Philosophy* 12 (2002), 285-303. [Essay review of three publications by Roshdi Rashed: *G eom etrie et dioptrique au Xe si ecle*, *Ibn Sahl, al-Quhi et Ibn al-Haytham* (Paris, 1993), *Oeuvres Philosophiques et Scientifiques d'al-Kindi, vol. I: L'Optique et la catoptrique* (Leiden, 1997) and *Les Catoptriciens grecs* (Paris, 2000)].

BENNETT, Jim, 'Shopping for Instruments in Paris and London', pp. 370-95 in Pamela Smith and Paula Findlen, eds., *Merchants and Marvels: Commerce, Science, and Art in Early Modern Europe* (New York and London: Routledge, 2002). ix +437 pages. ISBN 0-415-92815-X and 0-415-92816-8.

CLEEMPOEL, Koenraad van, *A Catalogue Raisonn e of Scientific Instruments From the Louvain School, 1530 to 1600* (Turnhout: Brepols Publishers, 2002). 284 pages. ISBN 2-503-51218-6.

[Introduction followed by catalogue of almost ninety instruments from Louvain masters, mainly Gerard Mercator, Michael Piquer, Gualterius Arsenius, Adrian Descrolières and Adrian Zeelst.]

CLERCQ, Peter de, 'The Special Loan Collection of Scientific Apparatus, South Kensington, 1876. Part 1: The 'Historical Treasures' in the *Illustrated London News* ; Part 2: The Historical Instruments; Part 3: Contemporary Publications, *Bulletin of the Scientific Instrument Society* 72 (March 2002), 11-19; 73 (June 2002), 8-16; 74 (September 2002), 16-21. [Discusses this 1876 exhibition primarily as a landmark in the development of the appreciation of historical scientific instruments. A fourth and final part is in preparation].

CLERCQ, Peter de, 'Report of a Visit of the SIS to the Royal Artillery Museum, Woolwich 23rd February 2002', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 33-35.

COOPER, Michael, 'From Graduations on Metal to Binary Biphase Modulation, or From Land and Hydrographic Surveying to Geomatics', *Bulletin of the Scientific Instrument Society* 72 (March 2002), 2-10. The Ninth SIS Annual Invitation Lecture, given on 28 November 2001 by Emeritus Professor of Engineering Surveying at the School of Engineering, City University London.

COSTA, Shelley, 'Marketing mathematics in early eighteenth-century England: Henry Beighton, certainty and the public sphere', *History of Science* 40 (2002), 211-232. [Includes a discussion of Beighton's activities in land-surveying and cartography, and the instruments he used, and partly developed himself.]

COWHAM, Mike, 'Punch Marking of Scientific Instruments', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 27-30

[CRAWFORTH-HITCHINS, D.F.], 'Beginner's Guide Part 3: Equal-arm scales and their accessories', *Equilibrium* 2002, nr. 1, 2655-2661, and 'Beginners' Guide Part 4: Steelyards', *Equilibrium* 2002, nr. 2, 2683-2690.

DAY, Jamie, 'The Barlow Planetarium: A History and Mechanical Analysis', *Rittenhouse* 55 (2002), 1-13. [Manufactured by Thomas Harris Barlow (1789-1865) and his son Milton, and acclaimed in the 1850 and 1860s, very few examples of this large planetarium survive].

DÉBARBAT, Suzanne and LAUNAY, Françoise, 'The Objectives of the 'Great Paris Exhibition Telescope' of 1900', *Bulletin of the Scientific Instrument Society* 74 (September 2002), 22-23. [The largest lenses ever successfully made to equip an astronomical refracting telescope have been rediscovered in a cellar of the *Observatoire de Paris*].

DENNERT, Irene, 'Aristo Slide Rule Production in Bavaria', *Journal of the Oughtred Society* 11, nr. 1 (Spring 2002), 17-22. [Personal memories of widow of Hans Dennert († 2000), with systematic photographic record of slide rule production in 1962.]

DICK, Wolfgang R. and HAMEL, Jürgen, eds., *Astronomie von Olbers bis Schwarzschild. Nationale Entwicklungen und internationale Beziehungen im 19. Jahrhundert*. Acta Historica

Astronomiae, vol. 14 (Thun and Frankfurt am Main: Verlag Harri Deutsch, 2002). 243 pages, ISBN 3-8171-1667-5. Contains among others Felix LÜHNING, 'Johann Hieronymus Schroeters 25 füssiges Teleskop in Lilienthal. Bau, Funktion und seine Nachbildung im Model', Hans Joachim LEUE, 'Johann Gottlieb Schrader und der Lilienthaler Fernrohrbau' and Klaus SCHILLINGER, 'Zur Geschichte der Herschel-Teleskope im Mathematisch-Physikalischer Salon Dresden'.

DORIKENS, Maurice, ed., *Scientific Instruments and Museums. Proceedings of the XXth International Congress of History of Science (Liège, 20-26 July 1997), Volume XVI* (Turnhout: Brepols Publishers, 2002). 338 pages. ISBN 2-503-51369-7. Twenty-seven contributions, divided over three parts: The History of Gnomonics, National Inventories of Historical Scientific Instruments, and Miscellaneous. Contents: A. Sarah SYMONS, 'Egyptian shadow clocks' / Liba TAUB, 'Determining the Equinox in Alexandria: what were Ptolemy's rings used for?' / Allan A. MILLS, 'Sunlight and shadows' / Carlo TRIARICO, 'The old and the new Florentine gnomon' / Didier BESSOT, 'Projections géométriques et gnomonique au XVIIe siècle: exemplarité et singularité de Girard Desargues (1591-1661)' / Maria Mercè VILADRICH GRAU, 'Medieval Islamic horary quadrants for specific latitudes: their influence on the European tradition' / Jean-Michel FAIDIT, 'Le cadran astronomique, géographique et lunaire du Père Emmanuel de Viviers (1737) suivi d'une Bibliographie gnomonique de langue française' / R.G.W. ANDERSON, 'Instruments, inventories and catalogues' / Maurice DORIKENS and Liliane DORIKENS-VANPRAET, 'Problems and solutions in cataloguing a University Museum' / Jim BENNETT, 'Cataloguing a Museum : problems and solutions' / Rand B. EVANS, 'Dividing the effort: an inventory of historical psychological instruments' / Gloria Christine CLIFTON, 'The directory of British scientific instrument makers and its use in research' / Paolo BRENNI, 'The Italian scientific instrument heritage: an impossible inventory ?' / Jan TAPDRUP, 'Instruments in Denmark, what were their origins ?' / Françoise LE GUET TULLY et Jean DAVOIGNEAU, 'L'Inventaire du patrimoine astronomique en France' / Maria Margaret LOPES, 'Latin American Museums: comparative studies and links' / Gabriella RAMBALDI MORCHIO, 'Inventory of the instruments belonging to Cannizzaro's laboratory in Genoa (1855-1861)' / Marian FOURNIER, 'Towards a new information centre in the Museum Boerhaave' / Leili KRIIS-ILVES, 'Chemical instruments and collections from the 19th century in the History Museum of Tartu University' / Franco PALLADINO, 'I Fondi Italiani di antichi modelli e strumenti matematici' / Giorgio FARAGGIANA, 'Gli strumenti e le attrezzature del Laboratorio di costruzioni della Regia Scuola di applicazione per gl'ingegneri di Torino' / Günther OESTMANN, 'Measuring and dating the Arabic celestial globe at Dresden' / Isabel MALAQUIAS, 'Instruments, instrument-makers and the new physics' / Victor GUIJARRO MORA, 'Policy and scientific instrumentation in Spain during the 18th and 19th centuries' / Szilvia Andrea HOLLO and Lajos BARTHA, 'Astronomical instrument makers in Hungary between 1730 to 1830' / Jörg ZAUN, 'The success of the German instrument industry and the role of the *Deutsche Gesellschaft für Mechanik und Optik*'

DORIKENS, Maurice, and DORIKENS-VANPRAET, Liliane, 'The Stereoscopic Bioscope Disc by Duboscq', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 30-31.

ELMQVIST, Inga, 'Virtues and Vices: Scientific Instruments in 17th Century Art', *Bulletin of the Scientific Instrument Society* 74 (September 2002), 4-7.

EMERSON, R.L., 'The Scientific Interests of Archibald Campbell, 1st Earl of Ilay and 3rd Duke of Argyll (1682-1761', *Annals of Science* 59 (January 2002), 21-56. [Includes detailed discussion of his instruments (few of which survive), machines and toys.]

FARA, Patricia, *An Entertainment for Angels. Electricity in the Enlightenment* (London: Icon, 2002). 160 pages. ISBN 1-84046-3481. [Electrical experimental culture in the 18th century].

FOURNIER, Marian, 'Een microscoop van Antoni van Leeuwenhoek', *Gewina* 25 (2002), nr.1, 70-74. [In 1982, the Museum Boerhaave and the Science Museum held an exhibition on Leeuwenhoek, with nine of his microscopes, three silver, six brass. A fourth silver microscope has since emerged and was acquired by the Museum Boerhaave. It has been measured by Dr Van Zuylen†].

FRERCKS, Jan, *Die Forschungspraxis Hippolyte Fizeau's. Eine Charakterisierung ausgehend von der Replikation seines Ätherwindexperiments von 1852* (Wissenschaft und Technik Verlag, Berlin, 2001). 351 pages., illustrated. ISBN 3-89685-382-1. [Detailed account of Fizeau experiments and instruments on ether, and their replication].

GAUVIN, Jean-François, 'Physics French-Canadian Style? Paul Lorrain and Université de Montréal's Cockcroft-Walton Accelerator 1949-1964', *Rittenhouse* 55 (2002), 27-47

GREENSLADE JR., Thomas B., 'Apparatus for Natural Philosophy: The Microphone and the Coherer', *Rittenhouse* 55 (2002), 48-50

HADRAVOVA, Alena, and HADRAVA, Petr (eds.), *Kristan z Prachatic: Stavba a Uziti astrolabu* (Prague, Filosofia, 2001, 1st edition). 520 pp., ISBN 80-7007-148-6. With English summary. [First critical edition of the treatises on the *Composition and Use of the Astrolabe* by Cristannus de Prachaticz (Kristan of Prachatic, born post-1360, died 1439), Master of Charles University in Prague. The text is accompanied by an annotated Czech translation (plus computer-simulated images of the instrument created according to Cristannus' design) and appendices. A Latin/French version is due to be published by the Societé Internationale de l'Astrolabe in Paris in its *Astrolabica* book series. For further information see <http://www.asu.cas.cz/~had/kristan.html>]

HEERING, Peter, 'Analysing Experiments with Two Non-Canonical Devices: Jean Paul Marat's Helioscope and Perméomètre', *Bulletin of the Scientific Instrument Society* 74 (September 2002), 8-15. [On two reconstructed instruments, by a member of the Oldenburg University group].

HELBING, Mario Otto, 'Una prima illustrazione a stampa del termometro', *Nuncius* 2001, vol. 2, 523-529. [Paolo Aresi describes and illustrates a thermometer in his commentary on *De generatione et corruptione* (Milan, 1617), which is very early].

HENTSCHEL, Klaus, 'Spectroscopic Portraiture', *Annals of Science* 59 (2002), 57-82. [Qualitative work by spectroscopists before 1900, such as Piazzzi-Smyth, to prepare for example solar spectrum atlases].

HENTSCHEL, Klaus, *Mapping the Spectrum: Techniques of Visual Representation in Research and Teaching* (Oxford: OUP, 2002). xiv + 562 pages.

HICKS, Robert D., 'The Interpretation of Measuring Instruments in Museums', *Curator* 44 / 2 (2001) 179-193.

HIGTON, Hester, ed., *Sundials at Greenwich: A Catalogue of the Sundials, Nocturnals and Horary Quadrants in the National Maritime Museum* (Oxford University Press / National Maritime Museum, 2002). 442 pages, ISBN 0-19-850877-8.

HOSKIN, Michael, 'The Leviathan of Parsonstown: ambitions and achievements', *Journal for the History of Astronomy* 33 Part 1 (February 2002), 57-70. [On the large telescope at Birr Castle, Ireland, erected by the third Earl of Rosse and completed in 1845.]

LAMPREY, John P., *Hartmann's Practika, 'A Manual for Making Sundials and Astrolabes by Compass and Rule'* (Bellvue, Colorado, USA: 2002), 312 pages. ISBN 1-931947-00-7. [English. This is the first complete translation into any modern language of Georg Hartmann's (1489-1564) unpublished manuscript, Vin 12768, that resides in the Austrian National Library in Vienna, along with portions of two other Hartmann manuscripts in two other libraries. References, Appendix, Index, 160 figures and illustrations. Copies may be purchased from John Lamprey, P. O. Box 336, Bellvue, Colorado 80512 USA, e-mail: lamprey@frii.com]

LARUE, Budd J., 'John Mayall Jr. and W.H. Dallinger: nineteenth-century microscope collectors and critical microscopists', *Microscopy. Journal of the Quekett Microscopical Club* 36 (1992), 675-691. [Three unpublished letters by Mayall to Dallinger contain evidence of the early trade in antique microscopes and the production of copies or replicas for collections. This article has not been noted in previous SIC bibliographies.]

LINDGREN, Uta, 'Regiomontans Wahl. Nürnberg als Standort angewandter respektive praktischer Mathematik im 15. und beginnenden 16. Jahrhundert', *Anzeiger des Germanischen Nationalmuseum* (Nürnberg, 2002), 49-56. [Yearbook ISIN 1430-5496. Proceedings of a symposium on 'Art and applied arts from Nuremberg for the European market, 1400-1800'. Relevant to instrument historians are some papers on metallurgical analysis and this paper by Lindgren on the state of applied mathematics and instrument manufacture around the time Regiomontanus settled there (1471).]

MADDISON, Ron, 'A Most Exciting Time to Live: the Beginnings of the Great Yerkes Refractor', *Journal of the Antique Telescope Society* 22 (2002), 16-24

MARNEY, Patrick, and McCONNELL, Anita, 'Diagonal and Reticulated Barometers', *Antique Collecting* 36 (10) April 2002, 19-23. [Illustrated with pieces from the Science Museum and private collections. This 'horological issue' of *Antique Collecting* also has articles on the watchmakers Nicole, Nielsen & Co. by David Penney, on Renaissance clocks by Richard Garnier and on opera glasses by Frank Barraclough].

MESCHIARI, Alberto, 'Schede tecniche e istruzioni per l'uso di 160 microscopi di Giovanni Battista Amici Parte quarta 1847-1856', *Atti della Fondazione Giorgio Ronchi Anno LVII*, nr. 3 (May-June, 2002), 439-523. [The fourth part of the detailed list of the description and instruction of Amici's microscopes written by himself].

MÖRZER BRUYNS, Willem F.J. and TURNER, Anthony, 'Gertrude Hamilton, an American Instrument-Dealer in Paris', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 23-26. [Trading under the name of 'Mercator', this (probably) American lady sold antique instruments from a Paris shop in the second quarter of the 20th century.]

MORENO, Roberto, CLEEMPOEL, Koenraad van, and KING, David, 'A Recently Discovered Sixteenth-Century Spanish Astrolabe', *Annals of Science* 59 (October 2002), 331-362. [Universal astrolabe, Ø 115 mm., acquired by the Museo Nacional de Ciencia y Tecnología in Madrid in 1999. It may have been designed and made by Juan de Herrera.]

MORRISON-LOW, A.D., 'Feasting my eyes with the view of fine instruments': Scientific Instruments in Enlightenment Scotland, 1680-1820', pp. 17-53 in Charles W.J. Withers and Paul Wood, eds., *Science and Medicine in the Scottish Enlightenment* (East Linton (East Lothian): John Tuckwell, 2002). 350 pages. ISBN 1862322856.

MOULDER DE RIDDER, Jolanda, 'Eise Eisinga and his planetarium', *Journal of Astronomical History and Heritage*, vol.5 (2002), 65-87

NAKAMURA, Tsuko, 'Acceptance and adaptation of octants and sextants in Japan during the eighteenth and nineteenth centuries', *Journal of Astronomical History and Heritage*, vol.5 (2002), 9-20

ORCHISTON, Wayne, and SLEE, Bruce, 'Ingenuity and initiative in Australian radio astronomy: the Dover Heights 'hole-in-the-ground' antenna', *Journal of Astronomical History and Heritage*, vol.5 (2002), 21-34

OTNESS, Bob, and SCHURE, Conrad, 'Early French Slide Rules in Various Collections', *Journal of the Oughtred Society* 11, nr. 1 (Spring 2002), 28-35.

PAOLETTI, Allesandro and ROBOTTI, Nadia, *Fisica, Metereologia e Sismologia nell'Ottocento. Il Contributo del Seminario Vescovile di Chiavari* (Genua: Università degli Studi di Genova. Dipartimento di Fisica, 2000). 138 pages, no ISBN. [Catalogue of 300 instruments, predominantly 19th-century physics, of a seminary school near Genua in North-Italy. With 48 colour illustrations].

PYENSON, Lewis and GAUVIN, Jean-Francois, ed. *The Art of Teaching Physics: The Eighteenth-Century Demonstration Apparatus of Jean-Antoine Nollet, 1700-1770* (Also available in French: *L'art d'enseigner la physique: Les appareils de demonstration de Jean-Antoine Nollet, 1700-1770* (Sillery, Qc: Les Editions du Septentrion, 2002). 222 pages, ISBN 2-89448-320-1, 2002. [Comprehensive assessment of Nollet's life and work. With narrative studies

by authorities in Europe and North America, the book centres on the collection of instruments in the style of Nollet at the Stewart Museum in Montreal].

RICCINI, Raimonda, ed., *Gli occhiali presi sul serio. Arte, storia scienza e tecnologie della visione* (Milano: Silvana Editoriale, 2002). 190 pages. [Illustrated catalogue of an exhibition concerning the history of spectacles and other optical apparatus].

RUDD, Eugene, 'Antique Science and Technology Show in Arlington, Texas', *Rittenhouse* 55 (2002), 51-53

SIC: *XVIII International Scientific Instrument Symposium. Moscow-St. Petersburg, Russia, 20-25 September 1999. Proceedings* (Moscow: Scientific publishing center *Engineer*, 2002). 156 pages. ISBN 5-8208-0031-1. Contents: V.P. BORISOV, E.I. KOLCHINSKII, V.M. OREL, 'Foundation of the Russian Academy of Sciences and formation of the first scientific collections in Russia' / Peter DE CLERCQ, 'Scientific instruments from Holland for Czar Peter the Great and the Academy of Sciences in St. Petersburg' / V.V. SOROKIN, G.A. PONOMARIOVA, P.V. SCHEGLOV, 'Astronomy in the Moscow University during the 18th and the beginning of the 19th centuries' / Terje BRUNDTLAND, 'Instruments in the Arctic: the Norwegian Auroral Expedition to Novaja Semlja in 1902-03' / Paolo BRENNI, 'Who made what? The dilemma of signed instruments' / Anne C. VAN HELDEN, 'Stabilised forms of philosophical instruments' / Helga BEEZ, 'Glasses to see and be seen with - vision aids through eight centuries (Some aspects on the history of vision aids)' / Marvin BOLT, 'Saving a worn-out planetarium: is it an artifact or an exhibit?' / Enn HENDRE, 'The development of Golitsyn-Vilip's seismographs in Tartu (Estonia)' / Sofia TALAS, 'The universal thermometer of J.B. Micheli du Crest and the connections with G.F. Brander' / Roland WITTJE, 'Local factors of the Van de Graaff generator project at the Norwegian Institute of Technology in the mid 1930s'

SIS: [various authors], 'SIS Visit to North Germany, 11th-16th May 2002', *Bulletin of the Scientific Instrument Society* 74 (September 2002), 24-32. [Excursion by the Scientific Instrument Society to museums and institutions in Kiel, Bergedorf, Wingst, Bremerhaven, Bremen, Lilienthal, Oldenburg and Hamburg].

SLIDE RULE GAZETTE issue 2 appeared in Autumn 2001, with seventeen contributions. 92 pages. Published by the U.K. Slide Rule Circle.

SOULU, F., *Quelques instruments scientifiques d'Antoine d'Abbadie* (Hendaye: Château d'Antoine d'Abbadie, Fondation de l'Académie des Sciences, [2002]). 8 pages. [Illustrated booklet on some instruments owned or conceived by d'Abbadie (1810-1897), president of the French Academy of Sciences, to which he left his castle-cum-observatory at Hendaye].

STRASSER, Bruno J., 'Totems de laboratoires, microscopes électroniques et réseaux scientifiques. L'émergence de la biologie moléculaire à Genève (1945-1960)', *Revue d'histoire des sciences* 55, 1 (Janviers-Mars 2002), 5-43. [Electron microscopes at Geneva.].

TALAS, Sofia, 'J.B. Micheli du Crest's Thermometer and The Connections with G.F. Brander', *Bulletin of the Scientific Instrument Society* 72 (March 2002), 20-25

TALAS, Sofia, 'Jacques Barthélémy Micheli du Crests Thermometer und seine Beziehungen zu Georg Friedrich Brander', *Zeitschrift des Historischen Vereins für Schwaben* vol. 94 (2001), 177-221. [Extended version of the above, translated into German by Inge Keil, including transcription of the correspondence between the two men, exchanged in the period 1755-1760].

TALBOT, Stuart, 'Caleb Smith's Sea Quadrants of c. 1735 As Constructed by Thomas Heath and George Adams Snr of London', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 2-7

TIHON, Anne, LEURQUIN, Régine, & SCHEUREN, Claudy, *Une version byzantine du Traité sur l'astrolabe du Pseudo-Messahalla* (Bruylant-Academia, Louvain-la-Neuve, 2001 [= Corpus des Astronomes Byzantins, nr. X]), 96 pp. - ISBN 2-87209-629-9. [On a manuscript in the Bodleian Library, Oxford].

TURCK. J.A.V., *Original Modern Calculating Machines* (Chicago: Western Society of Engineers, 1921). 196 pages. Gemmary facsimile reprint, 2002.

TURSUNOV, O.S. and AZIZOV, S.H., 'A Medieval Observational Instrument in Tashkent', *Journal for the History of Astronomy* 33 Part 1 (February 2002), 41-44. [Structures on and nearby a tomb on a Tashkent cemetery may have been an astronomical instrument, in fact "one of the best preserved dioptric instruments of the early middle ages".]

WARNER, Deborah Jean, 'Stadia Surveying Comes to the United States', *Rittenhouse* 55 (2002), 15-26. [Discusses manufacture and introduction of tools used in this technique, which is similar to triangulation, but the surveyor remains stationary and observes a position of a graduated rod at the distant point. Introduced in the US around 1850].

WELLS, Francis and WYMAN, Tom, 'La Règle à Calcul: Lenoir, Gravet-Lenoir and Tavernier-Gravet Slide Rules', *Journal of the Oughtred Society* 11, nr. 1 (Spring 2002), 23-27. [Traces the role of Étienne Lenoir (1744-1832) and his son Paul-Etienne (1776-1827), France's premier instrument makers, and those who succeeded them, in the development and production of French slide rules.]

WILLACH, Rolf, 'The Wiesel Telescopes in Skokloster Castle and their Historical Background', *Bulletin of the Scientific Instrument Society* 73 (June 2002), 17-22. [Documents two incomplete telescopes by the Augsburg maker Johannes Wiesel (1583-1662) in this Swedish museum-castle].

WILLARD, R. Hendricks, 'UK Patents 1837-1865', *Equilibrium* 2002, Issue 1, 2663-2671.

WOOD, Andrew, *Magnetic Venture. The Story of Oxford Instruments* (Oxford University Press, 2001). 387 pages. ISBN 0-19-924108-2. [The first substantial spin-off company from Oxford University, established in 1959, grew into an international company pioneering developments in superconductivity and medical instruments. Written by co-founder of the firm.]

WYKA, Ewa, 'Kostki wg J. Napiera - wczesny instrument kalkulacyjny w zbiorach Muzeum Uniwersytetu Jagiellońskiego', *Zeszyty Naukowe Uniwersytetu Jagiellońskiego MCCXLIII*:

Opuscula Musealia [Kraków] 10 (2000), 255-265. [English 17th-century set of Napier's bones acquired by the Museum of the Jagellonian University, Cracow. With short English summary].

ZIK, Yaakov, 'Science and instruments: The telescope as a scientific instrument at the beginning of the seventeenth century', *Perspective on Science*, Vol. 9, Number 3 (Fall 2001), 259-284.

ZOLLER, Paul, 'The Diploidoscope Uncovered', *Bulletin of the Scientific Instrument Society* 72 (March 2002), 26-33. [Detailed study of simple transit-instrument for determining local noon].