# **Selected publications:**

## Books

- P. A. Fayolle, T. Yamamoto, <u>C. Vilbrandt</u>, P. Perrin, "Visualization of Functionally Defined Objects," *New Horizons of Parallel and Distributed Computing*, M. Guo and L. T. Yang (Eds.), Springer Science+Business Media, Inc., New York, ISBN 0-387-24434-4, 2005, pp. 267-282.
- D. Wei, R. Durikovic, S. Kazuhiro, M. Nobuhiko, <u>C. Vilbrandt</u>, *IT Text: Computer Graphics*, Ohmsha, Ltd., Tokyo, ISBN 4-274-13288-9, 2003, pp. 237-248, 255, 261-262.

### Journals

- <u>C. Vilbrandt</u>, G. Pasko, A. Pasko, P.-A. Fayolle, T. Vilbrandt, J.R. Goodwin, J.M. Goodwin, T.L. Kunii, "Cultural Heritage Preservation Using Constructive Shape Modeling," *Computer Graphics Forum*, Vol. 23, No. 1 (March 2004), Intl. Journal of the Eurographics Association, D. Duke and R. Scopigno (Eds.), Blackwell Publishing, UK, ISSN 0167-7055, pp. 25-41.
- G.Pasko, A. Pasko, <u>C. Vilbrandt</u>, T. Ikedo, "Shape Modeling Issues of Digital Preservation of Japanese Lacquer Ware and Temples," *Computer Graphics and Geometry*, Vol. 3, No. 3 (October 2001), V. Pilyugin (Ed.), Russian Federation State Committee on Publishing Reg. Number 018689.
- <u>C. Vilbrandt</u>, "Introduction to Extending the Freedoms of Free and Open Information, "*Journal of Shanghai University* (English Edition), University of Shanghai Press, Shanghai, China, Vol. 5, Suppl. (Sep. 2001), ISSN 1007-6417, pp. 181-188.
- S. Vyatkin, S. Chizhick, <u>C. Vilbrandt</u>, "Dynamic Distortion Correction with Viewpoint Motion and Non-Static Attitude of Projector," *Computer Graphics and Geometry*, Vol. 3, No. 1 (April 2001), V. Pilyugin (Ed.), Russian Federation State Committee on Publishing Reg. Number 018689.

### **Conference Proceedings**

- <u>C. Vilbrandt</u>, D. McLauglin, F. VanScoy, et al., "Aizu Cultural Heritage and Digital Technology," *10th International Conference on Virtual Systems and Multimedia VSMM* 2004 (17-19 November 2004, Gifu, Japan), Ohmsha, Ltd., H. Thwaites (Ed.), ISBN 4-274-90634-5, 2004, pp. 824-831.
- K. Kimura, <u>C. Vilbrandt</u>, "Independent Lightweight 3D Graphics for Mobile Phones," *4th International Conference on Computer and Information Technology CIT'04* (14-16 September 2004, Wuhan, China), IEEE Computer Society, D. Wei et al. (Eds.), ISBN 0-7695-2216-5, 2004, pp. 562-567.
- T. Vilbrandt, <u>C. Vilbrandt</u>, J.R. Goodwin, J.M. Goodwin, "Making It Realtime: Optimized Frameworks for Education and the Web," *3rd IASTED International Conference on Visualization, Imaging, and Image Processing - VIIP 2003* (8-10 September 2003, Benalmadena, Spain), ACTA Press, M.H. Hamza (Ed.), Vol. 2, ISBN 0-88986-382-2 (396-1), 2003, pp. 862-868.

- <u>C. Vilbrandt</u>, G. Pasko, T. Vilbrandt, P.-A. Fayolle, M. Kazakov, V. Adzhiev, A. Pasko, T.L. Kunii, "STAR Report: Reverse Construction of Cultural Heritage," *13th International Conference on Computer Graphics and Vision GraphiCon-2003* (5-10 September 2003, Moscow, Russia), Moscow State University and Eurographics Association, D. Ivanov (Ed.), ISBN 5-317-00788-7, 2003, pp. 22-30.
- <u>C. Vilbrandt</u>, G. Pasko, A. Pasko, P.-A. Fayolle, T. Vilbrandt, T.L. Kunii, "Alternatives to Metadata for Cultural Heritage Objects," 19th International Conference CIDOC/ADIT 2003 (International Committee for Documentation of the International Council of Museums / Automation Directions in Information and Museum Technologies, 1-5 September 2003, St. Petersburg, Russia), ICOM and the Russian Foundation of Fundamental Researches Grant No. 03-07-93018, A.V. Dremailov et al. (Eds.), 2003, pp. 86-87.
- T. Yamamoto, <u>C. Vilbrandt</u>, "Parallel HyperFun Polygonizer," *Parallel and Distributed Processing and Applications ISPA 2003 Proceedings Lecture Notes in Computer Science*, Springer-Verlag, M. Guo and L.T. Yang (Eds.), Vol. 2745(July 2003), ISSN 0302-9743, pp. 329 -345.
- C. Calef, T. Vilbrandt, <u>C. Vilbrandt</u>, J.M. Goodwin, J.R. Goodwin, "Exploring Historical Sites in Real Time," 2002 PNC Pacific Neighborhood Consortium Annual Conference and Joint Meetings (20-22 September 2002, Osaka, Japan), Osaka City University, Media Center, CD-ROM Proceedings.
- C. Calef, T. Vilbrandt, <u>C. Vilbrandt</u>, J.M. Goodwin, J.R. Goodwin, "Making It Realtime: Exploring the use of optimized realtime environments for historical simulation and education," *Museums and the Web 2002: Selected Papers*, Archives & Museum Informatics (Boston), D. Bearman and J. Trant (Eds.), ISBN 1-85626-25-8, 2002.
- <u>C. Vilbrandt</u>, J.M. Goodwin, J.R. Goodwin, A. Pasko, G. Pasko, "Dancing Buddhas: New Graphical Tools for Digital Cultural Heritage," *7th International Conference on Virtual Systems and Multimedia VSMM 2001* (25-27 October 2001, University of California Berkeley, USA), IEEE Computer Society, ISBN 0-7695-1402-2, 2001, pp.345-353.
- <u>C. Vilbrandt</u>, A. Pasko, G. Pasko, J.R. Goodwin, J.M. Goodwin, "Digital Preservation of Cultural Heritage through Constructive Modeling," *International Cultural Heritage Informatics Meeting ichim0l* (3-7 September 2001, Politecnico di Milano, Italy), European Commission IST (Information Society Technologies), D. Bearman and F. Garzotto (Eds.), Vol. 1, ISBN 1-885626-24-X, 2001, pp. 183-200.
- G. Pasko, A. Pasko, <u>C. Vilbrandt</u>, T. Ikedo, "Virtual Shikki and Sazaedo: ShapeModeling in Digital Preservation of Japanese Lacquer Ware and Temples," *17th Spring Conference on Computer Graphics SCCG '01* (25-28 April 2001, Budmerice, Slovakia), R. Durikovic and S. Czanner (Eds.), IEEE Computer Society, ISBN 0-7695-1215-1, 2001, pp. 147-154.
- <u>C. Vilbrandt</u>, J.M. Goodwin, J.R. Goodwin, "Digital Digging: Computer Models of Archaeological Sites: Enchiji in Aizu, Japan," *2001 PNC Pacific Neighborhood Consortium Annual Conference and Joint Meetings* (15-20 January 2001, Hong Kong), Computing Centre, Academia Sinica, Taiwan, R.O.C., 2001, CD-ROM Proceedings.
- S. Vyatkin, S. Chizhick, <u>C. Vilbrandt</u>, "Dynamic Distortion Correction with Viewpoint Motion and Non-Static Attitude of Projector," *3rd International Conference on Human and Computer HC2000* (6-9 September 2000, University of Aizu, Japan), M. Osano and J. Herder (Eds.), 2000, pp. 182-189.

- <u>C. Vilbrandt</u>, "GNU++GNUbook = Meritocracy," *O'Reilly Open Source Software Convention OSCON2000* (17-20 July 2000, Monterey, CA, USA), O'Reilly Publishers, refereed presenter of the GNUbook Project.
- <u>C. Vilbrandt</u>, J.M. Goodwin, J.R. Goodwin, "Computer Models of Historical Sites: Sazaedo - From the Aizu History Project," *1999 EBTI, ECAI, SEER & PNC Joint Meeting* (18-21 January 1999, Academia Sinica, Taipei, Taiwan, R.O.C.), PNC Secretariat (Eds.), ISBN 957-671-626-8, 1999, pp. 489-502.

#### Awarded works

• A. Pasko, <u>C. Vilbrandt</u>, K. Yamauchi, et. al., "HyperFun: International Free Software Project for Functionally Based Shape Modeling, Visualization and Animation in Digital Farming Environments," *ACMI Exhibition: Beyond CyberSpace* (10-14 March 2001, San Jose, CA, USA). The University of Aizu and the University of Hosei, by exclusive invitation and winning submission, presented the HyperFun Project at *ACMI*, an internationally prestigious conference and exhibition of computer technology with more than 25,000 visitors. The HyperFun Project created and distributed two thousand HyperFun CD-ROMs of English and Japanese free source "HyperFun Language Software Tools for Functionally Based Shape Modeling, Visualization and Animation." CD-ROMs included original multimedia artwork, as well as a fifty (50) page tutorial in English and Japanese.