

Thecla Schiphorst

Associate Professor
Associate Director, Undergraduate Curriculum Committee Chair
School of Interactive Arts & Technology (SIAT)
Faculty of Communication, Arts & Technology (FCAT)
Simon Fraser University
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Current Employment

Sep 2011 - Current	Associate Director, School of Interactive Arts and Technology (SIAT), Simon Fraser University
Sep 2012 - Current	Undergraduate Curriculum Committee Chair, School of Interactive Arts and Technology (SIAT), Simon Fraser University
May 2002 - Current	Associate Professor, School of Interactive Arts and Technology (SIAT), Simon Fraser University

Education

2008 Ph.D.	School of Computing, Communications and Electronics, Faculty of Technology, University of Plymouth, United Kingdom Dissertation: The Varieties of User Experience: Bridging Methodologies from Somatics and Performance to Human Computer Interaction
1993 M.A.	Interdisciplinary MA Under Special Arrangements, (School of Computing Science and Dance Program in the School for Contemporary Arts) Simon Fraser University, Canada Thesis: A Case Study of Merce Cunningham's Use of the Lifeforms Computer Choreographic System in the Making of "Trackers"
1984 B.G.S.	Courses in Dance and Computing Science, Simon Fraser University, Canada Dance Analysis Final Project: The Use of Laban Effort Shape Movement Analysis in the Animation of Human Figures
1976 Dipl.T.	Diploma of Technology in Computer Programming and Systems Analysis (AD equivalent), Magna Cum Laude, Academic Scholarship Recipient for Academic Achievement, British Columbia Institute of Technology, Canada

Professional Training

Jul 2010 – Aug 2013	CMA Certified Movement Analyst 2013 (certified through LIMS – Laban/Bartenieff Institute of Movement Studies, NYC, NY)
Nov 2010 – Aug 2012	Eric Franklin Teacher Training Method – Level I
Jun 2005 - Aug 2005	Pilates Teacher Training Theory Modules 1, 2 and 3
Sep 2003 - Jun 2004	Anatomy and Physiology Certification for Body Practitioners.
Sep 2002 - Dec 2003	Applied Kinesiology, BodyTalk Certification, Modules 1 through 9
Sep 2001 - Dec 2002	EMF Balancing Technique, Modules I through IV
Sep 1993 - Sep 1995	Applied Kinesiology, Touch for Health Modules 1 through 5.
Jun 1988 – Aug 1988	Applied Kinesiology - BMC: Body-Mind-Centering Movement Somatics Technique, developed by Bonnie Bainbridge Cohen
Sep 1982 - Sep 1984	Awareness Through Movement Feldenkrais Training
Jan 1976 – Dec 1995	Contemporary Modern Dance Technique (Cunningham, Limon, Contact Improvisation, Ballet, Butoh, Balinese) and Choreography training including: Merce Cunningham, Kei Takei, EDAM, and numerous others

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Previous Employment History - Academic Institutions

May 2000 - Apr 2002	Associate Professor, Interactive Arts Program, Technical University of British Columbia
Sep 1998 - Apr 2000	Assistant Professor, Interactive Arts, Technical University of British Columbia
Jan 1996 - Dec 1998	Faculty Member, Design School, Media School, Emily Carr Institute of Art and Design
May 1997 - Aug 1997	Faculty, Computers, Media and Technology, University of British Columbia
Jan 1991 - Dec 1995	Faculty, School of Design: Electronic Computer Design Program, Emily Carr College of Art and Design
Jun 1995 - Aug 1995	Co-Director and Faculty, Computed Art Summer Intensive, School for Contemporary Arts, Simon Fraser University
Sep 1994 - Oct 1994	Visiting Faculty, Studio of Creative Inquiry, Carnegie Melon University
Jun 1994 - Aug 1994	Co-Director and Faculty, Computed Art Summer Intensive, School for Contemporary Arts, Simon Fraser University
Jan 1992 - Feb 1992	Visiting Faculty, Design InterMedia Program: 3D Design and Interactive Systems, University of Madison-Wisconsin
Jan 1981 - Dec 1990	Continuing Faculty and Founding Member, Computer Programming and Systems Technology Department, Douglas College
Sep 1986 - Jun 1988	Sessional Faculty, School for Contemporary Arts, Dance Program, Simon Fraser University
Jan 1980 - Sep 1984	Faculty, Computer Programming and Systems Department, British Columbia Institute of Technology

Previous Employment History – ICT Industry

Jan 1980 - Aug 1985	Contract Computer Programmer/ Systems Analyst, Software Support and Maintenance for SME's
Jun 1979 - Jun 1983	Associate Systems Analyst and Computer Programmer, Daniel R. Wilson and Associates Software Development Systems Design, Software Design and Implementation
Jun 1976 - Aug 1979	Computer Programmer and Systems Analyst, Finning Tractor and Equipment Company Limited Software Design and Implementation for Networked Applications
Jan 1976 - Aug 1976	Computer Programmer, British Columbia Institute of Technology Contract for Software Design, Implementation, Testing and Documentation

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Teaching

Courses Taught at SFU (since 2002)

IAT 801 Qualitative Research Methods and Design: (graduate course). Spring 2010 (27 students); Fall 2012 (17 students); Fall 2013. The course is an introduction to qualitative research methods and design. It covers structures of research that are prevalent across and at the intersection of fields, introduces research methodologies and tools, and teaches methods for interdisciplinary work. Students will investigate the application of qualitative methods in the context of interdisciplinary research focusing on technology design and use.

IAT 883 Research Through Art: (special topics graduate course). Fall 2008. This course explores practice-based research in the context of interactive-art. It investigates how artistic practice can support emerging research methods in interdisciplinary fields including human computer interaction, embodied cognition and computation and interactive performance & installation.

IAT 881 Performance & Technology: (graduate course). Fall 2009. Co-taught with Philippe Pasquier & Henry Daniel. The course is designed as a critical exploration of performance + technology practice that fuses the creative and computational possibilities of interactive art in its application to new technology research. The comparative role of performativity, interactivity and technology is presented and explored.

IAT 884 Skin, Clothes & Buildings: (special topics graduate course). Spring 2006. Co-taught with Maia Engeli. The course explores technological mediation between body and space, citing examples from architecture, design, interactive art and performance. Mobile technologies, public space and performance spaces are explored through the presence and activation of mobile devices, responsive fashions, responsive objects activated by casual or professional users.

IAT 883 Embodied Interaction: (graduate course). Spring 2006. The course is an introduction to embodied cognition and interaction in the context of interaction design. A survey of the literature in embodied and phenomenological research is used as a starting point to design an interactive project that incorporates embodied interaction within its design process.

IART 600 Media Practice & Theory: (graduate course). Fall 2002. The course is an introduction to media art practice and theory, surveying key literature and interactive works in the field.

IAT 422 Fabricating Wearable Technology – Experience Design Studio. Fall 2006. 46 students. A design studio course focusing on wearable technology, & soft-circuit design. Students research contemporary wearable technology examples, develop DIY skills, and conceptualize an interactive wearable concept. Students integrate design process into the conceptualization, development and implementation of interactive wearable technologies.

IAT 402 | 403 | 404 | 405 Capstone Design Studio. Co-taught with Lyn Bartram, Eric Yang, Ken Zupan. This two-semester course focuses on the design, implementation and communication of a media arts, design or informatics project (or any combination of these) and is the senior capstone project for SIAT students. Students can choose to work with cultural, research or industry mentors.

IAT 322 Performance & Media Arts. Fall 2005. 17 students. The course is an introduction to Performance and Media Arts. It explores the history of new media and interactive performance in the late twentieth century.

IAT 320 Body Interface. Spring 2006 (53 students). Taught as IART 331-3 in Spring 2003 (17 students), Spring 2004 (24 students), Spring 2005 (30 students). Explores concepts of embodiment, knowledge and space within the human relationship to technology. Students will construct and analyze contemporary and historical models of bodily interaction with machines, understand physical practices of embodiment and apply these concepts to representation, design and the production of artistic interface.

IART 410-12 MetaSystems. Fall 2004 (81 students). The course is an exploration of Methodologies for Design from the perspective of collaboration, constructivist approaches to developing design thinking, and exploration techniques for developing design scenarios.

IART 407-9 Object Interaction. Fall 2002 co-taught with Jim Budd (23 students); Spring 2004 (17 students). An introduction to physical computing and sensor based systems focusing on the design of smart objects.

IART 328-30 Kinaesthetic Space. Fall 2003 (24 students). An introduction to interaction design that focuses on felt experience, movement and kinaesthetic interaction as resource for developing interactive design strategies.

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Graduate Student Supervision

Senior Supervisor (active students)

Name	Degree	Project/Thesis Title	Status	Began	Estimated Completion
Carlson, Kristin	Ph.D.	Developing Tools For Choreographic Practice: Cognition, Movement Quality and Motion Capture	Active	2011-3	2014-3
Subyen, Pat	Ph.D.	(Co-Supervise with Philippe Pasquier) Toward Developing a Generative Visual Expressive System Based on Laban Movement Qualities Research	Active ABD	2009-3	2013-3
Unterman, Ben	Ph.D.	Toward a Theory of Identifying the Social Determinants of CoPresence in Online Mediated Performance	Active ABD	2009-1	2014-2
Sharifi, Parjad	Ph.D.	Toward a Theory of Bioscenography: A Practice Based Approach to Developing a Scenography for Performance	Active ABD	2008-3	2013-3
Levisohn, Aaron	Ph.D.	Movement Tags: Incorporating Movement Interaction as Semantic Descriptions for Image Collections	Active ABD	2007-3	2013-3

Senior Supervisor (students completed)

Name	Degree	Project/Thesis Title	Status	Began	Completed
Corness, Greg	Ph.D.	Exploring Intuition as a parameter of interactive performance	Completed	2006-1	2013-2
Choi, Suk Kyoung	M.A.	Interactive Organic Art Forms: How Embodied Artistic Processes can Inform Technological Artifacts	Completed	2010-3	2013-1
Maranan, Diego	M.A.	'Liquid' Moving Bodies: Utilizing Social Networking and Participant Observation to Explore Movement Vocabulary and Analysis of Culturally Adopted Movement Forms	Completed	2009-3	2012-3
Carlson, Kristin	M.A.	Cognition in Choreographic Practice: A Phenomenological Study of Situated Decision-Making	Completed	2009-3	2011-2
Ashenhurst, Erin	M.A.	Snap/Shot: Identify, Memory and the Digital Mediation of Experience	Completed	2009-3	2011-2
Tzankova, Veronika	M.A.	Turkish Liminal Sexualities: A Case Study of Social Transformations Beyond the 'Real' and the 'Virtual'	Completed	2008-1	2011-2
He, Yin	M.Sc.	Designing a Wearable Social Network	Completed	2007-3	2009-3
Bogart, Ben	M.Sc.	Memory Association Machine: An Account of the Realization and Interpretation of an Autonomous Responsive Site-Specific Artwork	Completed	2006-3	2009-1
Motamedi, Nima	M.A.	Language for Touch: Aesthetics, Experience and Technologies for Next Generation Touch Interfaces	Completed	2006-1	2008-1
Humphrey, Dennis	M.Ap.Sc.	Sensate Skins: Exploring Touch in Interaction	Completed	2002-3	2007-1

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Serving on a Supervisory Committee (active)

Name	Degree	Project/Thesis Title	Status	Began	Estimated Completion
Bogart, Ben	Ph.D.	Memory Association Machine: An Account of the Realization and Interpretation of an Autonomous Responsive Site-Specific Artwork	Active ABD	2009-3	2014-2
Akhgari, Mozghan	Ph.D.	Developing a Digital ToolKit for Painterly Approaches to Representation of Facial Features	Active	2008-1	
Castellanos, Carlos	Ph.D.	Towards a Phenomenological Theory of Symbiogenic Experiences in theArts	Active ABD	2007-3	2013-3

Serving on a Supervisory Committee (completed)

Name	Degree	Project/Thesis Title	Status	Began	Completed
Aghabeigi, Bardia	M.Sc.	Understanding and Evaluating Cooperative Video Games	Completed	2009-3	2011-1
Bevans, Allen	M.Sc.	Investigating the Effects of Bimanual Multitouch Interaction on Creativity	Completed	2009-3	2011-2
Oppenheimer, Robin	Ph.D.	The Strange Dance: 9 Evenings: Theatre & Engineering as Creative Collaboration	Completed	2008-1	2011-1
Johnston, David	M.Sc.	Fertile Synthesis: Emotion in Online Poetry	Completed	2006-1	2007-2
Seo, Jinsil	Ph.D.	Aesthetics of Immersion in Interactive Immersive Environments: A phenomenological case study of Light Strings	Completed	2006-1	2011-2

External Examiner

External Examiner at University of Sydney: Interaction Design and Human Practices Laboratory of Software Engineering and Information Technology

Larssen, Astrid	Ph.D.	How it Feels, not Just How it Looks an Understanding of Kinaesthetic and Proprioceptive of Interaction with Technology	HCI – Movement Interaction	Fall 2008	January 2011
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Significant Research Publications

Schiphorst, T., Calvert, T., Lee, C., Welman, C., & Guadet, S., (1990). Tools for Interaction with the Creative Process of Composition, *Proceedings of SIGCHI: CHI '90, Empowering People: the SIGCHI Conference on Human Factors in Computing Systems*, ACM Press, 1990, New Orleans, LA. pp. 167-174

This early paper explores the nature of creative composition particularly as it applies to dance, and describes the development of the early interactive computer based tools to assist in the creative process of choreography. The hierarchical nature of the composition process calls for an interface which allows the composer the flexibility to move back and forth between alternate views and conceptual levels of abstraction. This early innovation in computer tools for exploring movement presaged Merce Cunningham's use of what was to become Danceforms. The historical significance is the exploration of computational support tools for creative process in which the user visually and kinaesthetically composes movement in space and in time, and is able to review and evaluate compositionally at multiple levels of abstraction.

(Google Scholar: 34 citations; ACM Digital Library: 11 citations)

Schiphorst, T. (1997). Making Dances with a Computer, *Choreography and Dance: an international journal, special issue: Merce Cunningham: Creative Elements in choreography and dance*, edited by David Vaughan, Harwood Academic Publishers, Vol 4 part 3, 1997, pp. 79 - 98

This paper describes the important historical relationship in the field of Dance & Technology between Merce Cunningham and his use of the computer choreographic software, LifeForms. In 1968, over twenty years before LifeForms was installed in his Westbeth studio in New York City, Merce Cunningham wrote about the possibility of a computer technology that would move beyond notation to enable dance to be kinaesthetically explored with a computer. Cunningham embraced this new tool and his method of creating movement for dance evolved and expanded radically as a result. This paper describes Merce Cunningham's unique use of the computer choreographic software from the point of view of Cunningham's own choreographic process. The author is a member of the design team that developed LifeForms, and worked with Merce Cunningham in New York City since December from 1989 to 2005 supporting his creation of new dance with the computer.

(Google Scholar: 10 citations)

Schiphorst, T., Andersen, K., (2004). Between Bodies: using Experience Modeling to Create Gestural Protocols for Physiological Data Transfer, *altCHI, CHI 2004*, CHI April 2004, Vienna, (pp 1-8)

This paper introduces techniques from somatic body-based practices and illustrates their value within technology design processes in HCI. It describes the concept of gestural protocols and illustrates how these protocols or scripts can be used to access and share 'self-data' through biometric exchange. By highlighting the concept of human experience as a 'skill' that can be ameliorated through technology, we can reconsider how to apply experience design processes within HCI. In the paper, workshop participants utilized gesture as an expressive indicator of intentionality, extension of body image, permission, control, exchange and play.

(Google Scholar: 25 citations)

Schiphorst, T. (2009), soft(n): Towards a Somaesthetics of Touch, *CHI EA '09: CHI '09 Extended Abstracts on Human Factors in Computing Systems CHI 2009*, April 4 - 9, 2009, Boston, MA, USA: ACM Press, pp. 2427-2438.

This paper explores the concept of *somaesthetics* as an approach to the design of expressive interaction within HCI. This concept is exemplified through the design process of soft(n), an interactive tangible art installation developed in conjunction with V2_Lab in Rotterdam. Somaesthetics is a term coined by Richard Shusterman, a pragmatist philosopher interested in the critical study of bodily experience as a focus of sensory-aesthetic appreciation and agency. In the context of interaction, somaesthetics offers a bridging strategy between embodied practices based in somatics, and the design of an aesthetics of interaction for HCI. This paper argues for the value of exploring design strategies that employ a somaesthetic approach, presents a definitional framework of somaesthetics that can be applied to interaction, and links the concept of somaesthetics to a specific design case in which tactile interaction is applied to the design of a networked, tangible interactive artwork called soft(n).

(Google Scholar: 20 citations ACM Digital Library: 11 citations)

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Publications

Chapters in Books

Schiphorst, T., (2012) Forward (invited), in *Identity, Performance and Technology: Practices of empowerment, embodiment and technicity*, Eds. Broadhurst, S. and Machon, J., Palgrave Macmillan, pp. xi-xvii.

Tzankova, V., & Schiphorst, T. (2011). Constructing Meaning: Verbalizing the Unspeakable in Turkish Political Cartoons, ed. Frank Bramlett, Palgrave MacMillan, pp. 5-20.

Schiphorst, T., Soft, softer, softly: whispering between the lines, Book Chapter, *aRt+D: Research and Development in Art*, V2_Publishing, NAI Publishers, V2 June 2005, Rotterdam. ISBN 90-5662-389-3, pp 166-176.

aRt&D: Research and Development in Art provides insight into art practice through essays in which artists write about their design processes in developing interactive media artworks. The book contains contributions by the award-winning performance group Blast Theory, media artist Thecla Schiphorst, art critics Josephine Bosma and Rudolf Frieling, media theorist Andy Cameron, curators Mark Hansen and Inke Arns, philosopher Andrew Benjamin, and others. Timothy Druckrey evaluates the importance of artistic research and development. *aRt&D* focuses on interdisciplinary research and development from an artistic perspective.

Schiphorst, T. (2002). Body Interface, navigation sense and state space, *The Art of Programming, Sonic Acts*, Dec 2002, Digital art music and education, Amsterdam Paradiso, pp. 48-55.

Schiphorst, T. (1992). The Choreography Machine: A Design Tool For Character and Human Movement, *CyberArts: Exploring Art and Technology*, Miller Freeman Inc., Book Division, San Francisco, CA, 1992, pp 147-154.

Journal Publications

Schiphorst, T., & Calvert, T., (2013), Creative Collaboration: The evolution of software for dance, *Computational Culture, a journal of software studies*, special issue on software practices in digital performance, eds, Salazar, N., Fuller, M., ISSN 2047-2390, in press

Giabbanelli, P., Deck, P., Andres, L., Schiphorst, T., Finegood, D., (2013), Supporting a Participant-Centric Management of Obesity via a Self-Improving Health Game, *Lecture Notes in Computer Science Series*, Volume 8025, 8 pages, in press

Levisohn A.M., Schiphorst, T. (2011) Embodied Engagement: Supporting Movement Awareness in Ubiquitous Computing Systems. *Ubiquitous Learning: An International Journal*. 97-111.

Tzankova, V. & Schiphorst, T. (2010). Visualization of Islamic Religious Symbolism on the Internet: A Conceptual Blending, *Parsons Journal for Info. Mapping*, Volume 2, Issue 4, online
<http://piim.newschool.edu/journal/issues/2010/04/>

Schiphorst, T., (2009). Body Matters: the Palpability of the Invisible Computer, *Leonardo, Special Issue: Materials for Creativity*, Eds. Elissa Giaccardi & Lynda Candy, LEONARDO, Vol. 42, No. 3, 2009, pp. 225-230

Schiphorst, T., (2006) Affectionate Computing: Can We Fall in Love with a Machine? *MultiMedia Impact*, Ed. Frank Nack, *IEEE Multimedia*, January - March 2006, pp. 20 - 24

Schiphorst, T., (2006) Breath, skin and clothing: Using wearable technologies as an Interface into ourselves, *International Journal of Performance Arts and Digital Media*, *PADM 2* (2) Intellect 2006, pp. 171-186.

Cunningham, M., Vaughan D., Schiphorst, T., Carolyn, B., Kuhn, L., (2004) Four Key Discoveries: Merce Cunningham Dance Company at Fifty, *Theater*, Vol. 34, No 2, 2004, Yale School of Drama, pp 105-111.

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- Schiphorst, T. (1998) Le mouvement assiste par ordinateur: Merce Cunningham, *Nouvelle De Danse, La Composition*, No. 36|37, 1998, ContreDanse, Bruxelles, Belgique
- Schiphorst, T. (1997) Hacking the Future Body: public girls, cyborg girls, *Catalogue Essay for Public Girls Exhibition*, Curator Antonia Hirsch, artist Odette LeBlanc, Dec. 1997
- Schiphorst, T. (1997) Body Noise, Subtexts of Computers and Dance, *Computer Graphics*, Volume 31, Number 1, Feb., 1997, ACM Siggraph, pp 14 -15
- Schiphorst, T. (1997) Body Noise, Subtexts of Computers and Dance, *reprinted in Writings on Dance*, Volume 17, Dance on Screen, Summer 97/98, pp 70 -75
- Schiphorst, T. (1997). Le Cyborg Dansant, Corps 'extraordinaires', *PUCK, La marionette et les autres arts, Images Virtuelles*, Editions Institut International de la Marionette, Paris, France, No. 9, 1997, pp 90 - 97
- Schiphorst, T. (1997). Making Dances with a Computer, *Choreography and Dance: an international journal, special issue: Merce Cunningham: Creative Elements in choreography and dance*, edited by David Vaughan, Harwood Academic Publishers, Vol 4 part 3, 1997, pp. 79 - 98
- Calvert, T., Welman, C., Gaudet, S., Schiphorst, T. & Lee, C. (1991) Composition of multiple figure sequences for dance and animation, *Visual Computer*, Vol 7, Springer-Verlag, pp 114-121

Refereed Conference Proceedings

- Schiphorst, T., Bradley, B., Studd, K., Carlson, K. (2013). Movement Archeologies: Digging for Meaning in New Landscapes of Movement Data. *Conference on Corporeal Computing: A Performative Archeology of Digital Gesture*, IAS (Institute of Advanced Studies), University of Surrey, UK, 2 – 4 September 2013. 8 pages, in press.
- Subyen, P., Schiphorst, T., Pasquier, P. (2013). EMVIZ (flow): An Artistic Tool for Visualizing Movement Quality, *Electronic Visualization and the Arts London 2013 (EVA2013 London)*, Monday 29th July - Wednesday 31st July 2013, full paper 8 pages, in press.
- Schiphorst, T. (2013) self-evidence: a non-alienated view, *ISEA 2013*, 11th-13th June 2013 Sydney, Australia, Sydney University Press, submitted.
- Chung, W., Ip, E., Schiphorst, T. (2013) Wo.Defy: Designing Wearable Technology in the Context of Historical Cultural Resistance Practices, *ISEA 2013*, 11th-13th June 2013 Sydney, Australia, Sydney University Press, submitted.
- Corness, G., Schiphorst, T. (2013) Performing with a System's Intention: Embodied Cues in Performer-System Interaction, *Creativity & Cognition 2013*, 17th – 20th June 2013 Sydney, Australia, New York: ACM Press, pp. 156-164.
- Maranan, D., Schiphorst, T., Bartram, L., Hwang, H., (2013) Expressing Technological Metaphors in Dance Using Structural Illusion from Embodied Motion, *Creativity & Cognition 2013*, 17th – 20th June 2013 Sydney, Australia, New York: ACM Press, pp. 165-174.
- Carlson, K., Schiphorst, T., (2013) Defamiliarization and Paired Constraints: Designing for User's Creative Decision-Making, *Creativity & Cognition 2013*, 17th – 20th June 2013 Sydney, Australia, New York: ACM Press, pp. 300-303.
- Schiphorst, T., Sheppard, R., Loke, L. (2013) Beautiful Dance Moves: Designing Computational Models for Movement, *Workshop, Creativity & Cognition 2013*, 17th – 20th June 2013 Sydney, Australia, New York: ACM Press, pp. 430-434.
- Forghani, A., Neustaedter, C., Schiphorst, T., (2013). Investigating the Communication Patterns of Distance-Separated Grandparents and Grandchildren. *CHI EA '13: CHI '13 Extended Abstracts on Human Factors in Computing Systems*, Paris, France: ACM Press, pp. 67-72
- England, D., Fantauzzacoffin, J., Schiphorst, T., LaTulipe, C., Candy, L., (2013). Digital Art: Challenging Perspectives (invited SIG). *CHI EA '13: CHI '13 Extended Abstracts on Human Factors in Computing Systems*, Paris, France: ACM Press, pp. 2497-2500

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- Schiphorst, T., Chung, W., Ip, E. (2013) Wo.Defy: Wearable Interaction Design Inspired by a Chinese 19th Century Suffragette Movement, *TEI '13: Proceedings of the 7th International Conference on Tangible, Embedded and Embodied Interaction*, Barcelona, Spain, ACM Press, pp. 319-322
- Fantauzzacoffin, J., Candy, L., Chenzira, A., Edmonds, E., England, D., Schiphorst, T., Tanaka, A., (2012). Articulating Lines of Research in Digital Arts, HCI, and Interaction (Invited SIG). CHI EA '12: *CHI '12 Extended Abstracts on Human Factors in Computing Systems*, Austin, Texas, USA: ACM Press, pp. 1177-1180
- Wilde, D., Schiphorst, T., Klooster, S., (2011). Move to Design | Design to Move: A Conversation About Designing for the Body. *Forum: Lets Get Physical*, Ed. Eva Hoernecker, **interactions**, Volume 18 Issue 4, July 2011, ACM Press, pp. 22-27
- Schiphorst, T. (2011). Self-Evidence: Applying Somatic Connoisseurship to Experience Design, *CHI'11: Case Study CHI '11 Extended Abstracts on Human Factors in Computing Systems*, Vancouver, BC, Canada: ACM Press, pp. 145-160
- Schiphorst, T. (2011). tendrils: Exploring the Poetics of Collective Touch in Wearable Art, *TEI11: Proceedings of the 27th International Conference, Extended Abstracts on Human Factors in Computing Systems*, TEI'11, January 22-26, 2011, Funchal, Portugal: ACM Press, pp. 397-398
- Corness, G., Carlson, K., Schiphorst, T. (2011) Audience Empathy: A Phenomenological Method for Mediated Performance' *The 8th ACM Conference on Creativity and Cognition*, ACM Press. pp. 127-136. **Nominated for an Emma Award for Best Contribution to Creative Communication.**
- Carlson, K., Schiphorst, T., Shaw, C. (2011) ActionPlot: A Visualizing Tool for Contemporary Dance Analysis, *In Proceedings of Computational Aesthetic 2011 Eurographics Workshop on Computational Aesthetics in Graphics, Visualization and Imaging*, Cae'11, Vancouver, BC, ACM Press, pp. 113-120.
- Carlson, K., Schiphorst, T., Pasquier, P., (2011) Scuddle: Generating Movement Catalysts for Computer-Aided Choreography, *The Second International Conference on Computational Creativity*, (ICCCX), ACM Press, pp. 123-128. **Best Paper Award from the Cognitive Science Society**
- Levisohn, A. (2011). Designing for Movement Experience. *CHI'11: Proceedings of the 29th International Conference, Doctoral Consortium, extended abstracts on Human Factors in Computing Systems*, Vancouver, BC, Canada, New York: ACM Press, pp. 1029-1032
- Subyen, P., Maranan, D., Schiphorst, T., Pasquier, P., & Bartram, L. (2011). EMVIZ: the poetics of movement quality visualization. *Proceedings of the International Symposium on Computational Aesthetics in Graphics, Visualization, and Imaging*, CAe '11, CAe 2011, Vancouver, British Columbia, Canada, Aug5 – 7, 2011: ACM Press, pp. 121-128
- Ashenhurst, E., Schiphorst, T. (2011). Pixel Perfect: Performativity and Self Portraiture, *ISEA 2011*, Istanbul, Turkey, 8 pages.
- Subyen, P., Maranan, D., Schiphorst, T. & Pasquier, P. (2010). Mapping, Meaning and Motion: Designing Abstract Visualization of Movement Qualities, *Digital Resources for the Humanities & Arts 2010: Sensual Technologies - Collaborative Practices of Interdisciplinarity*, pp. 121-128
- Schiphorst, T., Seo, J., Jaffe, N. (2010). Exploring Touch and Breath in Networked Wearable Installation Design, *MM10: Proceedings of the International Conference on Multimedia, extended abstracts on Human Factors in Computing Systems*, MM'10, October 25-29, 2010, Firenze, Italy: ACM Press, pp. 1399-1400.
- Carlson, K., Corness, G., Schiphorst, T., (2010) Plan, Action, Collaboration: Reflecting on an Interdisciplinary Collaborative Process, *Proceedings from The Embodiment of Authority Conference*, Sibelius Academy, Helsinki, Finland, September 10-12, 2010. 8 pages, online at <http://www.siba.fi/web/embodimentofauthority/proceedings/carlson-corness-schiphorst>
- Ashenhurst, E. & Schiphorst, T. (2010). Scene(ic): performativity and visual narrative in amateur digital photography. *In ACM SIGGRAPH ASIA 2010 Posters (SA '10)*. ACM, New York, NY, USA, Article 9, 1 page, DOI=10.1145/1900354.190036

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- Schiphorst, T. (2009), soft(n): Towards a Somaesthetics of Touch, *CHI EA '09: CHI '09 Extended Abstracts on Human Factors in Computing Systems CHI 2009*, April 4 – 9, 2009, Boston, MA, USA: ACM Press, pp. 2427-2438.
- He, Y., Schiphorst, T., (2009). Designing Social Computing using Traditions of Symbolism, Personalization, and Gift Culture, *CSE'09, International Conference on Computational Science and Engineering, IEEE, Volume 4*, pp. 659-666
- He, Y., Schiphorst, T., (2009). Designing a Wearable Social Network. *CHI EA '09: CHI '09 Extended Abstracts on Human Factors in Computing Systems*, ACM Press, pp. 3353-3358
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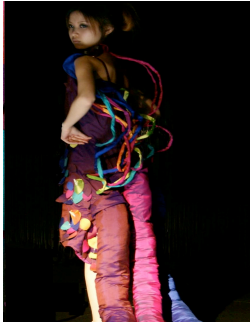
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Exhibitions

The Exhibitions category is divided into two sections: *Exhibited Artworks* and *Exhibition History*. *Exhibited Art Works* summarizes each Art Work and lists production credits. *Exhibition History* provides a date-ordered history of exhibition venues. This section includes: Art Work title, Exhibition title, Exhibition Dates, Curator, Principle Artist, and Exhibition Context such as gallery, festival, conference, solo or group showing.

Exhibited Artworks

tendrils interactive wearable art installation, 2010 – 2012



Project Dates: September 2010 to present
Artist and Creative Concept: Thecla Schiphorst & Jinsil Hwaryoung Seo
Creative Director: Sang Mah
Hardware Design and Engineering Mentor: Norman Jaffe
Software Design: Rui Guerra, Michiel KauwATjoe, V2_Lab
Software Tactile Gesture Recognition: Norman Jaffe
Physical Object Co-Design and Construction: Meta Vaghan, Fashion Designer
tendrils 1.0 development with SIAT students: Meta Vaughan, Michael Chang, Lisa Guo, Kyle Jung, "Matt" Karakilic, Kyle Sakai, Moein Sabouhiyan
tendrils 2.0 development with SIAT students: Jack Chen, Mark (Lu) Cheng, Stephanie Guzman, Maxine Kim, Justin Sy, Gareth (CJ) Wee.
Funded by: Canada Council for the Arts, SSHRC

Description: *tendrils* is a responsive kinetic wearable art-work in the form of an interactive garment that responds to shared active touch, both locally on the garment and collectively through remote networked wearable armbands that are a part of the *tendrils* network. *tendrils* explores poetic design constructs through material explorations, using soft-circuits and networked mobile computing incorporating the themes of experience, poetics, materiality, and semantics of interaction as design strategies in our concept of somaesthetics of design

(soft'') survival strategies for interaction, interactive public art installation, 2005 – 2007



Supported by V2_ Institute for the Unstable Media for premiere at the Dutch Electronic Arts Festival *DEAF07: interact or die*, Rotterdam, April 10th-29th 2007.
Project Dates: September 2005 to April 2007
Artist and Creative Concept: Thecla Schiphorst
Artist selected in International Call by V2; Competition conducted April 2005
V2_Lab Manager: Anne Nigten
Project Manager: Siuli Ko Pullan, V2_Lab
Hardware Design and Engineering, Stock, Simon De Bakker, V2_Lab
Software Design: Rui Guerra, Michiel KauwATjoe, V2_Lab
Software Tactile Gesture Recognition: Norman Jaffe, Aurel Systems
Physical Object Co-Design and Construction: Bonana van Mil, Fashion Designer
Sound Design: Mark Brady
Passepartout Academic Partner: Frank Nack, CWI, Centrum voor Wiskunde en Informatica
Passepartout Academic Partner: Lora Aroya, Eindhoven University of Technology
Funded by: Passepartout Project EU Dutch Consortium in conjunction with Philips Inc, TU/E, CWI, and V2_Institute for the Unstable Media

Description: *soft(n)* explores *intimacy* and *experience* through physical interaction with 10 networked soft objects that exhibit emerging behavior when touched or moved within a space. The network recognizes the *quality* of tactile and kinesthetic interaction, responding to *how* objects are touched or moved. Interaction with the soft objects elicits behaviors such as humming, shaking, sighing, singing and shared moving luminous patterns. Each soft object is hand constructed and contains a specially designed, hand-sewn and custom-engineered soft-intelligent-tactile input surface, motion detectors, and an ability to respond through vibration, light, and sound.

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move.me, single-user interaction prototype for *soft(n)*, 2005 – 2006



Supported by V2_ Institute for the Unstable Media
Project Dates: September 2005 to April 2006
Artist and Creative Concept: Thecla Schiphorst
Production Credits: see *soft(n)* above

Description: *move.me* is the prototype system for *soft(n)* and the first phase user test scenario for the V2_Lab contribution to the Dutch EU Passepartout project. This initial proof of concept enabled iterative testing of hardware, software, fabric construction and user interaction. A single interactive cushion/pillow was designed to test ambient response and control within a home entertainment environment.

exhale: breath between bodies, interactive wearable public art exhibition.



Principle Investigator: Thecla Schiphorst
Funding: Canarie, Heritage Canada, SFU President's Research Grant, Nokia
Project Dates: 2003 – 2005
In collaboration with *the whisper[s]* research group: <http://whisper.iat.sfu.ca>
Artistic Director, Concept, Systems Design: Thecla Schiphorst
Performance and Dramaturgical Design: Susan Kozel
Project Manager: Sang Mah
Software Engineering: Rob Lovell, Norm Jaffe
Hardware Engineering: Jan Erkuu, Calvin Chow
Fashion Design and Construction: Gretchen Elsner
Sound Design: Mark Brady
Production and Video: Camille Baker
Production Assistants: Alex Mateesco, Malahat Hussein
Web Design: Adam Marston

Description: **exhale: breath between bodies** explores the empathic nature of networked breath. Networked breath is used to create output patterns through small vibrators sewn into the inside of the waistband lining, and fans embedded in the lining of these sensually evocative skirts. This response enables a hidden and "inner" one-to-one communication between bodies in the installation, so that one body's breathing can directly affect another body's skirt. While individual data is represented inside the skirt, collective group-breath is made visible on the exterior layers of fabric on the skirts by using a specialized LED arrays that "light up" in a continuous cycle according to collective breath rhythm. Breath bands wrapped around the chest measure the ebb and flow of the breath cycle. Communication protocol was ported to Nokia Smart Phones.

<between bodies> ... wearables for the telepathically impaired, interactive wearable public art exhibition.



Principle Investigator: Thecla Schiphorst
Funding: Canarie, Heritage Canada, SFU Discovery Grant
Project Dates: 2003 – 2004
In collaboration with *the whisper[s]* research group: <http://whisper.iat.sfu.ca>
Artistic Director, Concept, Systems Design: Thecla Schiphorst
Performance Concept and Jewelry Design: Susan Kozel
Project Manager: Sang Mah
Software Engineering: Rob Lovell, Norm Jaffe
Hardware Engineering: Jan Erkuu, Calvin Chow
Fashion Design and Construction: Gretchen Elsner
Production and Video: Camille Baker
Web Design: Adam Marston

Description: **<between bodies>** the precursor to **exhale**, was an interaction prototype exploring a wearable network of skirts. **<between bodies>** uses EMG sensors that detect muscle contraction sewn into garter belts worn beneath the skirts. The skirts respond to movement with small motors that detect the wearer's movement, moving the exterior wall of the skirt fabric as if it is alive. The metaphor of the use of the skirt lining is the creation of an inner experience for the participant, non-visual but palpably physical. Toshiba PDA's were used in "Body Area Networks" situated in garments worn on the body.

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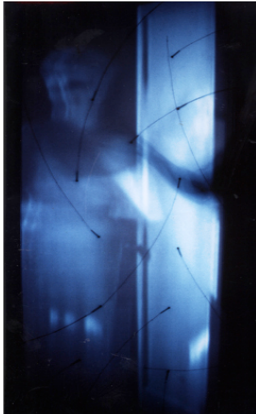
whisper: wearable body architectures, interactive wearable public art exhibition.



Principle Investigator: Thecla Schiphorst
Funding and Artist Collaborator: Susan Kozel
Funding: Daniel Langlois Fondation for the Arts, Canada Council for the Arts, BC Arts Council, V2_Lab and DEAF03, Future Physical | Shinkansen
Project Dates: 2001 – 2003
Artistic Concept, Systems Design: Thecla Schiphorst
Artistic Collaborator: Susan Kozel
Interaction Designer: Kristina Andersen
Project Manager: Sang Mah
Software Engineering: Rob Lovell, Norm Jaffe, Andruud Kerne, Stock (V2),
Mathematical Visualization: Julie Tolmie
Hardware Engineering: Stock, V2_Lab; Jan Erkuu, whisper[s] research group
Garment Design: Thecla Schiphorst, Kristina Andersen
Garment Construction: Kristina Andersen, Maryan Schiphorst-Meek
Production and Video: Camille Baker

Description: ***whisper: wearable body architectures*** was the first in a series of three interactive wearable public art installations that explore interaction with one's own body data. *whisper* is an acronym for [**w**earable, **h**andheld, **i**ntimate, **s**ensory, **p**ersonal, **e**xpressive, **r**esponsive **s**ystem], a term that is now used to describe the focus of the research group. The *whisper* installation is based on small wearable microcontrollers, and wireless network transmission using physiological data: heart rate and breath. Visualization and sonification of body data interaction is projected onto the floor in small "light pools". Participants share data through specially designed snaps located on the jackets.

Felt Histories, Interactive Computer Video Art Installation



Principle Investigator, Artist: Thecla Schiphorst
Funding: Canada Council for the Arts, BC Arts Council
Project Dates: 1998 – 2000
Artistic Concept, Systems Design: Thecla Schiphorst
Software Engineering: Ken Gregory, Grant Gregson, Norm Jaffe
Sound Design: Ken Gregory
Hardware Engineering: Carlos Vela-Martinez
Sensor Wall Design: Ken Gregory, Carlos Vela-Martinez
Sensor Wall Construction: Carlos Vela-Martinez
Video Shoot Director: Thecla Schiphorst
Video Editing: Thecla Schiphorst
Woman in Door: Helena Schiphorst
Lighting: Grant Gregson
Production Assistant: Bernadette MacGregor
Documentation Video Editing: Lorna Boschmann

Description: ***Felt Histories*** is a networked computer interactive sound and video installation. It contains a specially designed tactile sensor surface embedded within a doorframe contained at the end of a 20 foot long corridor. The interface responds through the participants act of touch. Video and sound is mixed in real time through a networked computer system, and rear-projected through a plexiglass surface that is embedded with small piezo-sensors. Story fragments of an older woman are represented through projected video image and sound. She responds to the users touch (direction, pressure, area), engaging the user in various scenarios that occur at the threshold of the door-frame. The pace of the work is extended, sensual and attenuated.

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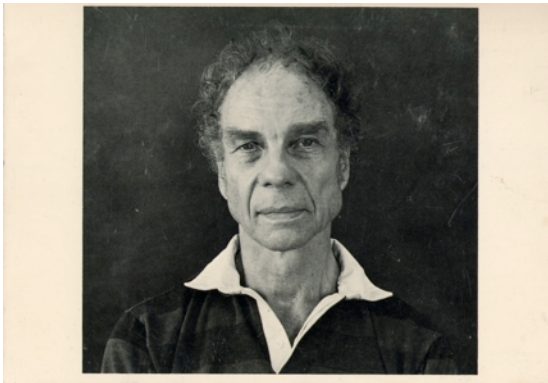
Bodymaps: artifacts of Touch, Interactive Computer Video Art Installation



Artist and Director: Thecla Schiphorst
Funding: Canada Council for the Arts, BC Arts Council
Project Dates: 1995 – 1997
Artistic Concept, Systems Design: Thecla Schiphorst
Software: Ken Gregory, Norm Jaffe, Grant Gregson,
Sound Design: Ken Gregory
Hardware Engineering: Infusion Systems
Table Design: Hanif Jan Mohammed
Table Construction: Ewan McNeil
Video Director and Video Editing: Thecla Schiphorst
Video Bodies: Thecla Schiphorst, Nathan Evans
Production Assistant: Bernadette MacGregor
Documentation Video Editing: Lorna Boschmann

Description: ***Bodymaps: artifacts of Touch*** is a computer interactive sound and video installation. The piece uses a specially designed sensor surface that is embedded beneath white velvet. Images are projected on the surface from above. Touch and proximity sensors detect a participant's presence and contact with the surface. The piece is silent until caressed. It responds to proximity and caress with movement and sound. The effect is sensual, disturbing, highly charged and openly affective. The intent of the work is to create a relationship between participant and technology that invokes a space of experience, reflection and vulnerability, a delicate balance that attempts to incite an awareness of one's relationship with oneself through the act of touch.

immerce, Interactive Interface to Merce Cunningham's Dance Database



Artist and Director: Thecla Schiphorst
Funding: Centre for Image and Sound Research (CISR)
Project Dates: 1993 – 1994
Artistic Concept, Systems Design: Thecla Schiphorst
Software: Stephen Hawryshko
Interaction Design: Thecla Schiphorst
Sound: John Cage
Choreography: Merce Cunningham
Video: Elliot Caplan
Executive Producer: Justine Bizzocchi
Cunningham Dance Archive: David Vaghuan
Cunningham Dance Foundation: Michael Bloom

Description: In ***immerce*** dance material is explored and navigated using an interface metaphor based in part on Merce Cunningham's choreographic methods and in the nature of dance, which structures movement over time. Cunningham's process deals complexity, the incorporation of chance procedures, the relatedness of space and time, and multiple points of reference. Its development explores artistic, technological and research possibilities for interaction between two partners: the participant, who explores the dance material, and the system, which organizes and presents the material. This prototype project is designed to reveal the scope of the Cunningham dance archive and the richness of Cunningham's dance material collected from over fifty years of making dance, and to provide a mechanism to support a deeper understanding of the nature of dance through Cunningham's work.

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Exhibition History

Wo.Defy Creators Exhibition, Tangible, Embedded and Embodied Interaction conference, ISEA 2013, June 11-13 2013, Sydney, Australia.

Wo.Defy Art-Exhibition exhibition, Tangible, Embedded and Embodied Interaction conference, TEI 2013, February 10-13 2013, Barcelona, Spain.

tendrils 2.0 Michel Journiac Gallery in Paris, **Aesthetic Transactions: Art et philosophie à l'état vif**, curated by Richard Shusterman, This group exhibition includes seven artists with whom Richard Shusterman has worked: Luca Del Baldo (Italy); Carsten Höller (Sweden); ORLAN (France); Pan, Gongkai (China); Thecla Schiphorst (Canada) & Jinsil Seo (USA); Tatiana Trouvé (France); and Yann Toma (France). A live performance of the interactive, wearable artwork *tendrils* (by Jinsil Seo and Thecla Schiphorst) was shown at the opening. The Université Paris 1, Panthéon-Sorbonne, Paris, France. May 24 – June 6th 2012. <http://www.fau.edu/bodymindculture/Conferences.php>

tendrils 2.0 Art-Explorations exhibition, Tangible, Embedded and Embodied Interaction Conference, TEI 2011, January 23-26th 2011, Funchal, Portugal.

tendrils and *exhale*: interactive public art exhibition. **Colorito: An Interactive Renaissance of Color**, exhibited at ACM Multimedia 2010 Interactive Art Program in Firenze Italy at the at the Palazzo Medici-Riccardi from 25 October through 6 November, 2010. Group Show with artists: Monika Fleischmann & Wolfgang Strauss, Tamiko Thiel, TPO, Victoria Vesna, Lea Buechley, Studio Azzurro, Bianco & Valente, Crucible Studio, Hung & Jacquemin, and Franz Fischnaller.
<http://www.acmmm10.org/program/interactive-art-exhibit/>

tendrils interactive kinetic garment, in **Electromode**, Interactive wearable art installation, part of **Code Live 2010**, exhibited at Emily Carr University of Art and Design, Cultural Olympiad, February 5th – 21st 2010. Group Exhibition including artists: Barbara Layne, Sara Diamond, Suzi Webster, Valerie Lamontagne, Joanna Berzowska, Thecla Schiphorst, Yin Gao. Artist: Thecla Schiphorst,

Electromode: Curated by Valérie Lamontagne (Canada) / Peau d'Âne

From research in science and art, wearable microcomputers and smart fabrics transform the body through dynamic, kinetic and shape-shifting garments that expand the body's possibilities.

(softⁿ) *survival strategies for interaction*, interactive public art installation, **PICNIC'07**, Westergasfabriek Amsterdam, The Netherlands, September 25-29th 2007. *PICNIC* Dre Wapenaar, Tent village. Group Exhibition, Artist: Thecla Schiphorst, **PICNIC'07** <http://www.picnicnetwork.org/artefact-10370-en.html>

PICNIC'07: uncork your brain! was held in Amsterdam in the Westergasfabriek from September 25-29th 2007. **PICNIC'07** was a conference, festival and a week of fresh, creative, innovative ideas. At this leading international event, creative minds from the worlds of media, entertainment, science and the arts convened from 25th-29th September. PICNIC calls itself a seductive, exciting, intangible, unpredictable, cosmopolitan and cheerful annual event for and by the creative industry. PICNIC'07 is a leading event in Europe in relation to creativity and innovation, and a part of Cross-Media Week. *The theme of FEEL MAKE PLAY* included an invitation of 20 international artists to contribute to the PICNIC environment, to show their work, to comment on PICNIC as a meeting place, and to add to the unique PICNIC experience.

exhale: breath between bodies, interactive public art exhibition. National Academy of Sciences, *Speculative Data and the Creative Imaginary: shared visions between art and technology*, Washington D.C., June 4th – August 24th 2007. Curated by Pamela Jennings. Artist: Thecla Schiphorst in collaboration with *The whisper[s] Research Group*. Group Exhibition including Sheldon Brown, Christa Sommerer and Laurant Mignonneau, Nell Breyer and Jonathan Bachrach, Ernest Edmonds, George Legrady, Thecla Schiphorst. http://www7.nationalacademies.org/arts/Speculative_Data_and_the_Creative_Imaginary.html

(softⁿ) *survival strategies for interaction*, interactive public art installation, commissioned by V2_Institute for the Unstable Media, for Dutch Electronic Arts Festival *DEAF07: interact or die*, Rotterdam, The Netherlands, April 10th-29th 2007. Group Exhibition, Artist: Thecla Schiphorst. DEAF07 Exhibition: http://www.deaf07.nl/index.php?option=com_program&act=project&Itemid=17 > soft(n)

The Dutch Electronic Arts Festival (DEAF) is an international and interdisciplinary biennial festival and conference that focuses on art, technology and society and is organized by V2_Institute for the Unstable

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Media, in Rotterdam, The Netherlands. DEAF presents a wide range of programme segments, including a large exhibition of interactive artworks and installations. The festival is characterized by a thematic approach and brings current developments and themes emerging from art in technological culture to diverse audiences. DEAF is an important international festival focusing on art and media technology, and can be regarded as a showcase for research and production of new media art. Work exhibited at DEAF is in a group exhibition context. <http://www.deaf07.nl/>

Bodymaps: artifacts of Touch, interactive art installation. Media Art Exhibition: *Can We Fall in Love with a Machine?* Curated by Murray Horne and Claudia Hart; Wood Street Galleries, Pittsburgh, Pennsylvania, January 2006 – April 2006. Group Show: www.woodstreetgalleries.org/. Artist: Thecla Schiphorst

Can We Fall in Love with a Machine? is an interactive media arts exhibition exploring interactivity that responds to, or contextualizes affection, adoration and affect.

exhale: breath between bodies, interactive public art exhibition. Digifest Exhibition and Symposium, *Digifest: mods*, Toronto, Harbourfront Centre and Ontario Science Centre, May 9th – 15th 2006. Artist: Thecla Schiphorst in collaboration with *The whisper[s] Research Group*
<http://www.ontariosciencecentre.ca/calendar/default.asp?eventid=486>

move.me smart objects + exhale: breath between bodies, interactive public art installation and demonstration. *Fleshing Out* Exhibition, Symposium + Workshop, V2_Lab, Rotterdam, The Netherlands, November 9th – 10th 2006. Artist and Principle Director for *exhale*: Thecla Schiphorst in collaboration with *The whisper[s] Research Group*. Artist and Principle Director for *move.me*: Thecla Schiphorst in collaboration with V2_Lab.
<http://www.virtueelplatform.nl/article-3553-en.html> and <http://www.virtueelplatform.nl/artefact-3047-en.html>

Fleshing Out Exhibition, Symposium and Workshop explored Wearable Interfaces, Smart Materials, and Living Fabrics. The exhibition was presented in parallel with the Symposium in order to demonstrate working prototypes in Art and Design Research. The event was part of a series produced by Virtueel Platform and V2_Institute for the Unstable Media exploring the public presentation of works in progress.

exhale: breath between bodies, interactive public art installation. *Emerging Technologies* and *Art Gallery* Exhibition, Siggraph 2005, Los Angeles Convention Center, July 31st - August 4th, 2005, Artist and Principle Director: Thecla Schiphorst in collaboration with *The whisper[s] Research Group*.
<http://www.siggraph.org/s2005/main.php?f=conference&p=etech&s=etech15> Group Exhibition.

Siggraph Emerging Technologies is an international exposition of new and emerging technology that highlights innovative applications and promising trends in digital technology. *exhale: breath between bodies* was one of three works at Siggraph 2005 selected for both the Emerging Technologies exhibition and the Siggraph Art Gallery, emphasizing artist-lead research producing technological innovation.

<between bodies>, interactive wearable public art presentation and exhibition, *New Forms Festival, Technography*, Vancouver, Roundhouse Centre, Oct 15-22 2004, Artist and Principle Director: Thecla Schiphorst in collaboration with Susan Kozel and *The whisper[s] Research Group*. Group Exhibition.

The New Forms Festival (NFF) is an international festival of contemporary media arts and technologies, held in Vancouver, BC, Canada. NFF showcases new media artists from across Canada and around the world, focusing on the convergence of arts and technology. <http://www.newformsfestival.com/nff04/>

<between bodies>, interactive wearable public art presentation and exhibition, *Ciberarts Festival*, Bilbao, Spain, Apr 20-30th 2004, exhibited as part of *The Evident Traces projects* curated by Christiane Paul (Whitney Museum). Artist and Principle Director: Thecla Schiphorst in collaboration with Susan Kozel and *The whisper[s] Research Group*. Group exhibition. Festival: http://www.ciberartfestival.net/instala_en.htm
About Exhibitions: <http://www.realtimearts.net/article/62/7506>

whisper: wearable body architectures, interactive wearable public art presentation and exhibition, *e-culture fair*, Paradiso Theatre, Amsterdam, The Netherlands, Oct 23-25 2003, Artist and Principle Director: Thecla Schiphorst in collaboration with Susan Kozel and *The whisper[s] Research Group*. Group exhibition.
http://www.e-culturefair.nl/site/index_en.html > projects > mymode

whisper: wearable body architectures, interactive wearable public art presentation and exhibition, *Respond Festival*, produced by *Future Physical*, Cambridge UK, April 2 – 6th 2003, curated by Ghislainne Boddington, Shinkansen and Lizzie Muller. Artist and Principle Director: Thecla Schiphorst in collaboration with Susan Kozel and *The whisper[s] Research Group*. Group Exhibition.
Respond Event: http://www.futurephysical.org/pages/content/resp_env/nex.html
Exhibition: <http://www.futurephysical.org/pages/programme/commissions.html> >co-productions >whisper

Thecla Schiphorst

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whisper: wearable body architectures, interactive wearable public art presentation and exhibition, Dutch Electronic Arts Festival, *DEAF03: Data Knitting*, Rotterdamse Schouwburg Theatre, Rotterdam, The Netherlands, Feb 23 – March 07 2003. Artist and Principle Director: Thecla Schiphorst in collaboration with Susan Kozel and *The whisper[s] Research Group*. Group exhibition. <http://www.deaf.v2.nl/03/>

The Dutch Electronic Arts Festival (DEAF) is an international and interdisciplinary biennial festival and conference that focuses on art, technology and society and is organized by V2_Institute for the Unstable Media, in Rotterdam, The Netherlands. DEAF presents a wide range of programme segments, including a large exhibition of interactive artworks and installations. The festival is characterized by a thematic approach and brings current developments and themes emerging from art in technological culture to diverse audiences. DEAF is an important international festival focusing on art and media technology, and can be regarded as a showcase for research and production of new media art. Work exhibited at DEAF is in a group exhibition context.

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, *Virtual Incarnations Dance Umbrella 2000 Exhibition*, ICA Gallery, London England, October – November 2000. Artist: Thecla Schiphorst. Group Exhibition with artists: Merce Cunningham, Paul Kaiser, David Rokeby, Thecla Schiphorst. See archive: <http://193.123.212.249/wwwselect.html>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Touche*, McKenzie Art Gallery, Regina, March - May 2000. Curated by Nina Czegledy, Artist: Thecla Schiphorst. Group Exhibition: Daniel Joliffe and Thecla Schiphorst. Mackenzie Art Gallery Archives http://www.mackenzieartgallery.ca/Exhibitions/Exhibition_Archives/

Felt Histories, Interactive Computer Video Art Installation, Media Art Exhibition at Gaerlock Gardens, *Oakville Galleries*, Oakville Ontario, February - April 2000, curated by Su Ditta, Artist: Thecla Schiphorst. Solo Exhibition. Oakville Gallery Website: <http://www.oakvillegalleries.com>

Felt Histories, Interactive Computer Video Art Installation, Media Art Exhibition: 7th *New York Digital Salon*, SVA, School of Visual Arts, New York City, December 1999 - January 2000. Artist: Thecla Schiphorst. Group Exhibition. New York Digital Salon: <http://www.nydigitalsalon.org/> 7th New York Digital Salon Installations: <http://www.nydigitalsalon.org/07/installationFrames.html>

Felt Histories, Interactive Computer Video Art Installation, Media Art Exhibition: *Nouveau Cinéma, Nouveaux Médias*, Montreal, Quebec, October 1999. Curated by Alain Mongeau, Artist: Thecla Schiphorst. Group Exhibition.

The Festival du Nouveau Cinéma de Montréal (FNC) is devoted to the dissemination and development of emerging trends in cinema and new media. It is a forum for audiences to discover original new works, particularly in cinéma d'auteur and digital creation. The Festival's strength lies above all in the quality of its programming, which has evolved in step with trends in cinema and new media.
http://www.nouveaucinema.ca/EN/index.php?module_b=corpo_nouvelles.php&module_a=corpo_historique.html&img=

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Digital Identity, Transforming Communities | Reinventing Ourselves*, Surrey Art Gallery, Surrey BC, Oct-Nov 1999. curated by Leane Davison. Artist: Thecla Schiphorst. Group Exhibition. <http://www.surrey.ca/Living+in+Surrey/Arts/Surrey+Art+Gallery/Exhibitions/Exhibition+History/Exhibition+History+Pages/1999.htm>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Digital Matter, Digital Memory*, Kenderdine Gallery, Saskatoon, Saskatchewan, Apr 23 – June 6th 1999. Curated by Patricia Levin. Artist: Thecla Schiphorst: Solo Exhibition. <http://www.usask.ca/kenderdine/home.html> > exhibition > archive > 1999 > digital matter, digital memory

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Touche*, Oboro Gallery, Montreal, Quebec, March 6th - April 9th 1999. Curated by Nina Czegledy, Artist: Thecla Schiphorst. Group Exhibition: Daniel Joliffe and Thecla Schiphorst. http://www.oboro.net/index_2_e.html > oboro > archives > archives since 1993 > 1998-1999 > Daniel Joliffe and Thecla Schiphorst | <http://www.oboro.net/archive/9899.html>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Touche*, Interaccess Gallery, Toronto, Ontario, January 22nd to February 17th 1999. Curated by Nina Czegledy,

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Artist: Thecla Schiphorst. Group Exhibition: Daniel Joliffe and Thecla Schiphorst,
<http://www.interaccess.org/exhibitions/index.php?id=43>

Felt Histories, Interactive Computer Video Art Installation, Media Art Exhibition: *Artspeak Gallery*, Vancouver, B.C., October 23rd to December 5th, 1998, curated by Susan Edelstein. Artist: Thecla Schiphorst. Solo Exhibition. <http://artspeak.ca/exhibitions/history.html> > 1998

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Body Mechanique: Artistic Explorations of Digital Realms*, Wexner Centre for the Arts, Columbus, Ohio, September 18th to January 6th, 1999. Curated by Sarah J. Rogers. Artist: Thecla Schiphorst. Group Exhibition including: Thecla Schiphorst, Beth Stryker/Sawad Brooks, Toni Dove, Merce Cunningham, Bill Seaman, Laurie Anderson, Jim Campbell, Alan Rath, Joseph Nechvatal. Wexner Center for the Arts website: <http://www.wexarts.org>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *The Interface: Edmonton Intermedia Arts Festival*, Latitude 53 Gallery, Edmonton, Alberta, August 23rd to September 5th, 1998. Artist: Thecla Schiphorst. Group Exhibition including artists Thecla Schiphorst, Ken Gregory, Lori Weidenhammer, Steve Heimbecker. <http://www.beams.ca/SeafSound.htm>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Cyberheart*, *Walter Phillips Gallery*, Banff, Alberta, May 29th to July 26th, 1998. Curated by Sara Diamond. Artist: Thecla Schiphorst. Group Exhibition including artists: Thecla Schiphorst, Heath Bunting, Jane Prophet, Catherine Richards, Josephine Starrs, Allecquere Stone, Natalie Jeremijenko. <http://www.banffcentre.ca/wpg/exhibitions/pre2001/> > Cyber Heart

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Ciber@rt Festival*, Valencia Spain, November 1998. Curated by Angela Molina. Artist: Thecla Schiphorst. Solo Exhibition. Ciberart History: <http://www.realtimearts.net/article/62/7506>

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Screens Festival*, Trondheim, Norway, October 5th to October 26th, 1998. Artist: Thecla Schiphorst. Group Exhibition including artists: Bill Viola, Thecla Schiphorst, Jane Prophet, Individual Electric, Graham Budgett, Ivar Smedstad, Birgitta Muhr.

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Electric Garden*, Siggraph '97, Los Angeles, 3-8 August 1997. Artist: Thecla Schiphorst. Group Exhibition. including artists: Thecla Schiphorst. Siggraph '97 Electric Garden <http://www.siggraph.org/s97/conference/garden/> Electric Garden Bodymaps: <http://www.siggraph.org/s97/conference/garden/bodymaps.html>

Cartographie du corps [Bodymaps: Artifacts of Touch], Interactive Computer Video Art Installation, Media Art Exhibition: *Centre Culturel Canadien*, Paris, France, June 23rd to July 31st, August 15th to Sept 26th 1998, Curated by France Trepanier. Artist: Thecla Schiphorst. Solo Exhibition.

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, Media Art Exhibition: *Escaping Gravity, Video positive Festival*, FACT, Foundation for Art and Creative Technology, Open Eye Gallery, Liverpool, England, April 11th to May 6th 1997. Artist: Thecla Schiphorst. Group Exhibition including artists: Thecla Schiphorst, Gordon Bennett, Bill Viola, Jaap De Jonge, Dieter Kiessling, Julie Myers, Tony Oursler, Jon McCormack, Jane Prophet. Video Positive FACT Foundation for Arts and Creative Technology archive: http://www.fact.co.uk/whatson/archive/?group=3&parent=27&link_id=27

Bodymaps: Artifacts of Touch, Interactive Computer Video Art Installation, *Interaction '97, Toward the Expansion of Media Art*, IAMAS, Gifu, Japan, March to April, 1997. Curated by Itsuo Sakane. Artist: Thecla Schiphorst. Group Exhibition. including artists Laurent Mignonneau/Christine Sommerer, Myron Krueger, Thecla Schiphorst, ART+COM, Jeffrey Shaw, Masaki Fujihata, Jim Campbell. Curated by Itsuo Sakane. Interaction '97 <http://www.iamas.ac.jp/interaction/i97/welcome.html> Artists Exhibitions: <http://www.iamas.ac.jp/interaction/i97/artists.html>

Bodymaps: Artifacts of Mortality, Interactive Computer Video Art Installation. Exhibition: *Ars Electronica, Mimesis: The Future of Evolution*, Prix Ars Electronica Exhibition, Landesgalerie, Linz Austria, September 3rd to 22nd, 1996. Artist: Thecla Schiphorst. Group Exhibition including artists Thecla Schiphorst, Simon Penny/Jamieson Schulte, Graham Harwood, Masaki Fujihata, Scott Snibbe, Natalie Jeremijenko, Nancy Patterson, Luc Courchesne. Mimesis '96 <http://www.aec.at/www-ars/home.html>

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Bodymaps: Artifacts of Mortality, Interactive Computer Video Art Installation, Media Art Exhibition: *Digital Investigations, Differential Space*, Western Front Gallery, March 19th – April 26th 1996. Curated by Petra Watson. Artist: Thecla Schiphorst. Solo Exhibition. The Western Front: <http://www.front.bc.ca/>
Past Exhibitions Bodymaps: Artifacts of Mortality <http://front.bc.ca/exhibitions/events/2944>

immerce, Interactive Computer Interactive CD-ROM, Database Exhibition: *il villaggio globale*, OVG incontri, ommaggio a McLuen, in collaboration with l'Ambasciata del Canada. Triennale di Milano, June 1995.

Performances

For all works listed below choreography and/or movement design by Thecla Schiphorst

exhale: breath between bodies: Canada House Pavilion, Winter Olympics, Torino, Italy, Feb 18th 2006.

Developed and choreographed 8 dancers for an interactive performance of *exhale: breath between bodies* to illustrate and exemplify networked wearable technologies and Canadian technology and design innovation, presented during New Media B.C. exposition.

exhale: breath between bodies: FutureFashion, Pisa, Italy, May 20th, 2006. Choreographed, Rehearsed and Developed choreography with 6 dancers for an interactive performance of *exhale: breath between bodies*. This performance was developed in the context of new interactive fashion that is integrating technology, communication and expressivity through smart textiles, soft circuits and urban design.

<http://www.cutecircuit.com/now/futurefashion-catalog/>

exhale: breath between bodies: Light Lantern Festival, September 17 2005, Shadbolt Centre for the Arts, Public Dreams Productions, included choreography, performance and working prototypes of interactive garment designs in context of light festival,

http://www.city.burnaby.bc.ca/cityhall/departments/departments_parks/prksrc_fclts/prksrc_fclts_shdblt.html

exhale: breath between bodies: CyberFasion Show Wired Woman, Vancouver October 2005, "What Wired Woman Wear", interactive fashion event, included choreography, performance and working prototypes of interactive garment designs, <http://www.wiredwoman.com/>

exhale: breath between bodies: Cyber-Fashion Show Siggraph August 2005, as part exhibition and festival in the context of ACM Siggraph, included choreography, performance and working prototypes of interactive garment designs, <http://psymbiote.org/cyflash/2005/>

< *between bodies* > Cyber-Fashion Show Siggraph August 2004, as part exhibition and festival in the context of ACM Siggraph, included choreography, performance and working prototypes of interactive garment designs, <http://www.siggraph.org/s2004/conference/studio/fashion.php?pageID=conference>

Orpheus and Eurydice, Opera by CW Gluck, choreographed for production by the Vancouver Modern Baroque Opera Company, Feb 5 - 15, 1997, Vancouver East Cultural Centre

Powers of Two, Choreographed and Danced in Multi-Media Music Theatre Piece commissioned by Computer Music Composer Barry Truax for the International Computer Music Conference (ICMC) at the Banff Centre September 4th. 5th 1995.

16 Pools, Western Front Lodge April 21st 1995, Interactive Computer Art Festival, Simon Fraser University Computed Art Intensive July 20, 21 1994, Interactive Performance Piece for two dancers and light activated space

Threshing, ISEA 1993, and Dancing on the Edge Festival September 8 - 14 1993 choreographed and performed for dancer, wireless microphone and video in collaboration with Louis-Philippe Demers

Escape, CyberArts International, Pasadena California October 29,30, 1992, ISEA, Sydney Australia, November13, 1992 (International Symposium on the Electronic Arts) The integrated multi-media performance work explored the interactive relationship between performer's movement, effects on lighting, sound, voice and image. The performer wearing a wireless microphone controlled lighting intensity, colour and trajectory, via voice and triggered events in collaboration with Louis-Philippe Demers. Choreographed and performed by Thecla Schiphorst

Viola, Shadow Project, Simon Fraser University, Studio II, August 1992, choreographed for interactive

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performance

Falling Bodies, The Halo Projects, integrated dance-video-projected virtual images performance, evening length dance performance, in conjunction with the FireHall Arts Centre, June 1991

Kopernicus, Opera by Claude Vivier, choreographed for production by the Vancouver New Music Society, Sept 28 thru October 6, 1990, Vancouver East Cultural Centre

Genevieve De Brabant (the Opera), choreography for work directed by Marc Diamond, music by Erik Satie, conducted by Owen Underhill, set design by Greg Snider, Erik Satie Opera and Interdisciplinary dance concert, Simon Fraser University Theatre, Jan 11-13 1990

Multi-Media

Portraits, for Piano a Numeros, piano piece for transduction, Thecla Schiphorst and Jocelyn Robert, Audio CD, 2002, invited collaboration between choreographer and composer: an exploration of Body State of movement captured through video, and mapped to electronic piano.

Curatorial Projects

Projects listed were curated by Thecla Schiphorst and Oliver Hockenhull, co-directors of the digital eARTh society, a non-profit digital arts organization.

ZDM, Zero Degree Monstrosities, digital eARTh, Festival and Symposium, Vancouver, BC, Canada, 2000

Ecstatic Data, digital eARTh, Canadian Media Exhibitions in London, Amsterdam, Stockholm, 1999

The New Materiality: pleasuring the immoderate senses, digital eARTh, daft festival, Vancouver, Mar-Apr 2000

Making Electricity/Rethinking Revolution, premiered Western Front Lodge, the Lux Lounge, Rethinking Revolution Festival, March 1998, Vancouver, B.C., digital eARTh, 1998

Transverse Worlds, premiered Western Front Lodge, the Lux Cabaret, Body Electric Festival, Vancouver, B.C.

BodyElectric, Masaki Fujihata artist Exhibition, Science World, Vancouver BC, May 1996

The Ecology of Communications, premiered Western Front, the Lux, Vancouver Electronic Arts Festival

Exhibition Catalogues

Schiphorst, T., *tendrils + exhale*, Colorito: An Interactive Renaissance of Color, exhibited at ACM Multimedia 2010 Interactive Art Program in Firenze Italy at the Palazzo Medici-Riccardi from 25 October through 6 November, 2010

Schiphorst, T., *tendrils*, CODE LIVE 2 Cultural Olympiad, in exhibition Catalogue of the *Electromode* in CODE LIVE 2, Curated by Valerie LaMontagne, February 2010.

Schiphorst, T., *exhale: breath between bodies*, National Academy of Sciences, in exhibition Catalogue of the *Speculative Data and the Creative Imaginary: shared visions between art and technology*, Curated by Pamela Jennings, July 2007.

Schiphorst, T., *exhale: (breath between bodies)*, in ACM Siggraph 2005 Emerging Technologies SIGGRAPH '05, July 2005, Article No. 6.

Schiphorst, T., *exhale: breath between bodies*, ACM SIGGRAPH 2005, in *Juried Artists: Electronic Art and Animation Catalog*, SIGGRAPH '05, pp. 62-63.

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Schiphorst, T., *Bodymaps: Artifacts of Touch*, in exhibition Catalogue *Body Mecanique*. Published By: Wexner Center for the Arts ISBN: 1881390195 ISBN13: 9781881390190 Publication Date: 02/02/1999

Schiphorst, T., *Felt Histories*, exhibition Catalogue of the *Felt Histories*, Gaerlock Gardens, Oakville Galleries, Oakville Ontario, February - April 2000, curated by Su Ditta

Schiphorst, T., *Felt Histories*, in exhibition Catalogue of the 7th New York Digital Salon, SVA, School of Visual Arts, New York City.

Schiphorst, T., *Felt Histories*, in exhibition Catalogue of *Nouveau Cinéma, Nouveaux Médias*, Montreal, Quebec, Oct '99. Curated by Alain Mongeau.

Schiphorst, T., *Bodymaps: Artifacts of Touch*, in exhibition Catalogue of *Touche*, Interaccess Gallery, Toronto, Ontario, January 22nd to February 17th 1999. Curated by Nina Czegledy

Schiphorst, T., *Felt Histories*, in exhibition Catalogue of Thecla Schiphorst, *Felt Histories*, *Artspeak Gallery*, Vancouver, Oct 23rd to Dec 5th, 1998, curated by Susan Edelstein

Schiphorst, T., *Bodymaps: Artifacts of Touch*, in exhibition Catalogue of *Escaping Gravity, Video positive Festival*, FACT Open Eye Gallery, Liverpool, England, April 11th to May 6th 1997

Schiphorst, T., *Bodymaps: Artifacts of Touch*, in exhibition Catalogue of *Interaction '97, Toward the Expansion of Media Art*, IAMAS, Gifu, Japan, March to April, 1997. Curated by Itsuo Sakane.

Schiphorst, T., *Bodymaps: Artifacts of Mortality*, in exhibition Catalogue of *Ars Electronica, Memesis: The Future of Evolution*, Prix Ars Electronica Exhibition, Landesgalerie, Linz Austria, Sept 3rd to 22nd, 1996.

Schiphorst, T., *Bodymaps: Artifacts of Mortality*, in exhibition Catalogue of *Digital Investigations, Differential Space*, Western Front Gallery, March 19th - April 26th 1996. Curated by Petra Watson

Selected Reviews

HorizonZero: Digital Arts and Culture in Canada, Issue 04: TOUCH, November 2002, "Artifacts of Touch: Thecla Schiphorst re-choreographs the relationship between technology and the public body", by Jeanne Randolph; <http://www.horizonzero.ca/textsite/touch.php?is=4&file=10&tlang=0>

HorizonZero: Digital Arts and Culture in Canada, Issue 04: TOUCH, November 2002, "Bodymaps, Thecla Schiphorst", by Eric Raymond; <http://www.horizonzero.ca/textsite/touch.php?is=4&file=9&tlang=0>

MUSE, Canadian Museums Association, "On the Questions of Museum Practices and New Technologies: reading Walter Benjamin through the digital lens", by Dot Tuer, XVIII/2

BackFlash, Canadian Journal of Photo-based and Electronic Art Production, Vol 17.1, "Felt Histories", 1999

Wired, October 1996 "LifeForm", pp 172 - 173, by Evantheia Schibsted

The Independent, Film and Video Review, "Thecla Schiphorst, Multimedia Artist", by Margaret Gallagher,

December 1996

The Guardian, April 17 1997, London England, "Beats Watching TV", R. Clark

Vancouver Sun, March 1996, "Caressing Electronic Bodymaps a contemplative experience", by Michael Scott

Canadian Theatre Review, "Interactive Media: Virtual Reality and the Actual Performer", Winter 1994, S. Aitken

Preview, Bodymaps, Mix Magazine, Issue 17, Summer 1996

El Mundo Cultural, Spain, Ciber@rt, October 28 1996

Mercado Laboral, Spain, Ciber@rt, October 6th, 1996

PBS, Scientific American Frontiers, *Walking After Midnight*, The making of animation: Dec 4 1992

CNN Interview: The World Today, *Science and Technology Report*, March 1991

BBC Interview: *The Late Show*, with Merce Cunningham, aired August 1992

CBC Newsworld Interview: *Ideas On Camera, Dance and the Computer*, Thecla Schiphorst interviewed by Max Allen, aired January 1992

TV Ontario, Art Effects: *Choreographic Innovation* aired December 1991

CBC Newsworld Panel Interview: *Computers and the Arts*, November 1991

CBC Radio *The Arts Report* New York CBC, premier of Trackers, March 1991

Panels Refereed

Ascott, R., Cos, D., Dolinsky, M., Gromala, D., Novak, M., Rogala, M., Schiphorst, T., Slattery, D., Vesna, V., "Artist Round Tables", ACM SIGGRAPH 2004 Art Gallery, SIGGRAPH '04, August '04, pp. 131-134.

Jeremijenko, N., Schiphorst, T., Mateus, M., Straus, W., Wright, W., Kerne, A., Siggraph Panel, "Extending interface practice: an ecosystem approach", ACM Siggraph 2002 abstracts, pp. 90-92.

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New Bodies, New Realities, Live Chat Room, Dance Umbrella 2000, October 2000, live webcast event with Thecla Schiphorst, Merce Cunningham, Paul Kaiser, Shelley Eshkar, Wayne McGregor; moderated by Ghislainne Boddington
Schiphorst, T. "Haunting and Hacking, the future body", 6CYBERCONF, Conference on CyberCulture and Technology, Oslo Norway, June '96

Invited Keynote + Speaker Presentations

Invited Lecture	GaTech 2013, Distinguished Lecturer Series, Brown Bag Lunch - Georgia Institute of Technology, Interactive Design and School of Computing, March 8-10th, 2013
Juried Course Presenter	CHI 2013 Course <i>Body, Whys & Videotape: Exploring Somatic Approaches to Interaction Design</i> , Paris France, May 2012
Keynote Respondent	CHI 2012 – Respondent to Invited Keynote Presentation of Richard Shusterman, topic "Somaesthetics and HCI"
Juried Course Presenter	CHI 2012 Course <i>Digital Arts and HCI</i> , Austin Texas, May 2012
Invited Lecture	Artist Residency Program, Texas A+M University, March 26 th 2012
Invited Lecture	Developing Knowledge Representation for Movement Interaction, August 2011, University of Illinois at Champaign-Urbana
Invited Keynote	DRHA 2010, Digital Resources in the Humanities and Arts 2010 Conference, London, Brunel University, Sept 5-8, 2010
Invited Speaker	Aesthetics and HCI Seminar, North Carolina University, March 2010
Invited Keynote	ECSCW, European Conference on Computer Supported Cooperative Work, Vienna, Sept 2009

Presentations Invited 2006-2007

Invited Keynote	Creativity and Cognition, 2007, Washington DC, July 12-15, 2007
Invited Speaker	Dutch Electronic Arts Festival DEAF07, Rotterdam, April 2007
Invited Keynote	NTA National Textiles Association, February 2007, South Carolina
Invited Presenter	Dancing Around Technology, V2_Lab Open Process Workshops, February 2007
Invited Lecture	Smart Fabrics Europe Conference, December 12-15 th 2006, Edinburgh, Scotland.
Invited Presenter	ITEA Passepartout Technical Demonstrations, Paris, Oct 11-14 th , 2006.
Invited Lecture	Smart Fabrics Conference, Intertech, March 2006, Miami
Invited Lecture	Digifest 2006, May 10-15 th , 2006, Toronto, Ontario Science Centre
Invited Lecture	Smart Fabrics Europe, Invited Lecture and Presentation, December 2006
Invited Lecture	Fleshing Out Exhibition and Symposium, Rotterdam, Amsterdam November 2006

Presentations Invited 2005

Invited Presentation	Nokia University Research Collaborations workshop; presentation: move.me project, Dec 15 th 2005, Nokia Vancouver
Invited Presentation	V2 research project presentation, October 17 th -18 th , research meetings, European partner, <passepartout> project
Invited Presentation	Digital Cultures Workshop and Lab, Nottingham England, University of Trent at Nottingham, workshop participant, conference presenter, November 27 th – Dec 4 th 2005.
Invited Presentation	V2 research project presentation, Dec 5 th 2005, research meetings, European partner, <passepartout> project
Invited Presentation	Banff, Bodies In Motion Seminar, June 24 th – 27 th 2005, research presentation, whisper[s] project
Invited Presentation	ASU Flexible Fabrics Research Presentation, ASU, June 2005
Invited Presentation	Canada Japan Culture New Media Days, New Media Exchange, Nagoya Expo, June 4-8, 2005, Japan Canada, Invited to represent Canada New Media Research, sponsored by Heritage Canada

Presentations Invited 2004

Invited Presentation	Consciousness Reframed Conference, Beijing, China, November 22-28 th 2004
Invited Presentation	Hexagram, Research visit and presentation, Concordia University and Thought Technology Inc, Oct 16-18 th 2004
Invited Panel Presentation	New Forms Festival, October 14-16 th 2004
Invited Lecture	Venice Biennale, Dance and Technology Symposium and Performances, June 2004

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Workshop Presentation Workshop Presentation, SigCHI 2004 Vienna, Austria, Workshop, "Cross Dressing and Border Crossings", CHI Workshop, ACMCHI 2004, April 2004, Vienna
Invited Participant SFU President's Research Lunch with Industry, January 2004.

Presentations Invited 2003

Invited Speaker Banff wireless workshop, Invited Speaker, Banff New Media Institute, "A case history of the whisper project", November 14 – 16th, 2003
Invited Speaker e-culture fair, Amsterdam, Wearable Technologies, sensory tools and performance, Oct. 23rd 2003, with Thecla Schiphorst (whisper), Joey Ryan, Institute of Sonology, STEIM, Jussi Angelsleve, Media Lab Europe
Invited Speaker RISQ2003-Canarie ANW2003, Networks for People: Accessibility > Performance > Results > Conference Montreal, "whisper: networking wearable community architectures", Oct 20-23, 2003,
Invited Panelist Merce Cunningham, The Four Discoveries, Presenter, Panelist, "Merce Cunningham's process with LifeForms, computer dance technology" BAM, Brooklyn Academy of Music, New York, Oct 18th 2003
Workshop Participant Workshop on Experiential Telepresence, Oct 7th 2003, ACM Multimedia Conference, SIGMM2003, Berkeley California, Oct 2-8 2003
Workshop Participant Biometrics Methods and Applications Workshop, ACM Multimedia Conference, SIGMM2003, Berkeley California, Oct 2-8 2003
Invited Speaker V2 – Waag Symposium, "whisper: wearable body architectures", Den Haag, The Netherlands, September 4 – 6 2003
Invited Speaker NewForms Festival, July 30 2003, Conference Roundtable, "whisper: wearable body architectures"
Invited Speaker Consciousness Reframed, Newport, University of Wales, "Wearing our<selves>", July 2003
Invited Speaker Nomadic Arts and Technology Conference, "BodyState: building our technologies through attention modeling", Zurich April 15-17 2003
Invited Speaker Venice Biennale, Conference on Dance and Technology, "Movement architectures: the dancing body within the machine", May 8-10th 2003
Invited Speaker Future Physical, invited presenter, Respond Festival and Conference, Cambridge, UK, April 1-5th 2003
Invited Panelist DEAF festival, Data Knitting, Women and Technology, Mar7th 2003

Presentations Invited 2002

Keynote Address Wear Me! Conference and Festival, Norfolk, England, produced by Future Physical, Dec 2002
Juried Presenter Bridges II, The Banff New Media Institute, October 4 – 6, 2002, Collaboration+Our Bodies
Invited Presenter BEAP, The Biennale of Electronic Arts, Perth University, Artist Talk, August 6th 2002
Invited Presenter Consciousness Reframed 2002: non-local, non-linear, non-ordinary, John Curtin Gallery, Curtin University of Technology, Perth, Western Australia, August 2-4th 2002
Juried Panelist Siggraph 2002, Panel: Extending Interface Practice, an ecosystem approach
Invited Panelist Theatre, Gender and Beyond, London, England SmartLab, Jul7-8th 2002
Invited Speaker V2-Lab, Seminar, V2- anarchiving conference, Pulp Fashion, Jul5th 2002
Invited Speaker Intimate Technologies, Banff Summit, Banff Centre for the Arts, April 25-28 2002
Juried Workshop Workshop on Physiological Computing, CHI2002, Minneapolis, Workshop Participant
Invited Panelist The Uncanny, Experiments in Cyborg Culture: reading the Cyborg, artist's panel, Vancouver Art Gallery, February 2002

Presentations Invited 2001 - 1999

Invited Speaker The Art of Software, Sonic Arts festival and Conference, Amsterdam, December 2001
Invited Speaker 9-11-N2N Networks to Nanosystems: Art, Science and Technology in Times of Crisis, UCLA, UC Santa Cruz, November 2001
Invited Speaker Foundation Year Artist Talk, Emily Carr Institute of Art and Design, August 2001
Invited Speaker Extreme Computing, Conference, Barcelona, July 2001
Invited Speaker e-naissance | new configurations of Mind, Body, and Space Conference, Turino, Italy April 2001

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Invited Speaker	Bridges Symposium, UCI, conference May 2001
Invited Speaker	ISEA, Paris, December 2000
Invited Speaker	Reframing Consciousness, University of Wales, August 2000
Invited Speaker	Interactive F[r]ictions, Narrative and the New Cinema, UCLA, May 2000
Invited Lecturer	Workshop Leader, Future Physical, Middlesex University, London, UK, September 1999
Invited Speaker	Emotional Computing, Banff Summit, Banff Centre for the Arts, March 1999

Presentations Invited 1998

Invited Speaker	Out of the Box, Banff Summit, Banff Centre for the Arts, September 1998
Invited Artist Presenter	Interactive Screen, Banff Summit, Banff Centre for the Arts, August 1998
Invited Speaker	8Cyberconf, Budapest, Hungary, <i>Connected Feminist Weirdness</i> , July 1998. Presenters included: Sandy Stone, Thecla Schiphorst, Kathy Rae Huffman, Sheila Urbanowski, Sally Jane Norman, Douglas Ruskoff
Invited Speaker	Avatar, Avatar!, Banff Summit, Banff Centre for the Arts, July 1998
Invited Speaker	Curating & Conserving New Media, Symposium & Workshop, Banff Arts, June 1998
Invited Panelist	Made In Corpus, Odyssud, March 1998, panelist in symposium <i>Les Métamorphoses du Corps: Figures Virtuelles, Clones et Chimères</i> . Presenters included Susan Kozel, Paul Virillio, Louis Bec, Thecla Schiphorst

Presentations Invited 1997

Invited Speaker	Ciber@rt Symposium, Valencia, Spain, Nov1997, directed by Angela Molina, Presenters included: Thecla Schiphorst, Wolfgang Strauss, Derrick De Kerchove, Malcolm Le Grice, Louis Bec
Invited Speaker	Beyond the Screen, Digital Dancing 1997, London, November 2nd 1997
Invited Presenter	Space.City <i>Surrogate Bodies</i> Presentation, October 1997, Seattle Art Gallery, Seattle, Washington. Presenters included: Thecla Schiphorst, Diane Gromala
Invited Speaker	Out of the Box, Banff Summit, Banff Centre for the Arts, September 1997
Invited Panelist	Screen Festival and Workshops, Trodheim, Norway, October 1997
Invited Speaker	Artist Talk, Paris, June 1997, Canadian Cultural Centre of New Media
Invited Speaker	Video Positive, Festival and Symposium, Liverpool, England, artist talk April 1997
Invited Panelist	Interaction '97, Ogaki City, Japan, March 1997, New Technologies and Interactivity, Artist Panel

Presentations Invited 1996 - 1995

Invited Panelist	Future Moves 96, DEAF Symposium and Festival, Rotterdam, September 23rd 1996
Invited Speaker	6Cyberconf, Oslo Norway, June 1997, <i>Hacking the Future Body</i>
Invited Speaker	ISEA, International Symposium for the Electronic Arts, Montreal, Que, Sept 1995
Invited Speaker	5cyberconf, Madrid, Spain, June 1996, <i>Bodymaps, synesthesia and interaction</i> , Presenters included: Sandy Stone, Manuel De Landa, Timothy Druckery, Sally Jane Norman, Heidi Gilpen, Thecla Schiphorst
Invited Speaker	Connected Bodies, Amsterdam, June 1996, <i>Re-connecting our virtual selves</i>
Invited Speaker	New York University, Performance Studies Department, April 1995
Invited Keynote	Being Human Series, Apres Coup, New York Psychoanalytic Society, <i>Bodies in Technology</i> , New York School of the Visual Arts, February 1995
Invited Speaker	York University, Third Annual Conference on Dance & Technology, May 1995
Invited Speaker	<i>il villaggio globale</i> , OVG incontri, omaggio a McLuen, in collaboration with l'Ambasciata del Canada. Triennale di Milano, June 1995

Presentations Invited 1994 - 1990

Invited Speaker	Charleroi Belgium, Festival, <i>Corps et Machina</i> April 1994. Presenters included Sally Jane Norman, David Rokeby, Stellarc, Derrick De Kerchove, Thecla Schiphorst
Invited Speaker	Amsterdam, Nederlands Theater Instituut, June 21 - 23 1994
Invited Lecture	IVirtu lecture series, Excellence in Design, HarbourCentre, Toronto, October 1991
Invited Speaker	University of Waterloo, Department of Architecture, <i>Gesture and Space</i> , October 1991
Invited Speaker	CETECH, Paris, European Colloquium on Culture, Economics and Technology November 1989
Invited Speaker	WINDOWS conference on Women in Computing Technology, UBC, Computing Science Department, Sept 1990

Thecla Schiphorst

Associate Professor, School of Interactive Arts & Technology
Simon Fraser University

Awards, Honors and Scholarships

- 2011 **Title:** Emma Award Nomination for Best Contribution to Creative Communication
Type: Research
Organization: Creativity and Cognition
Details: for paper publication: Corness, G., Carlson, K., Schiphorst, T. (2011) Audience Empathy: A Phenomenological Method for Mediated Performance' *The 8th ACM Conference on Creativity and Cognition*, ACM Press. 127-136.
- 2011 **Title:** Best Student Paper Award
Type: Research
Organization: Conference on Computational Creativity ICCCX
Details: for paper publication: Carlson, K., Schiphorst, T., Pasquier, P., (2011) Scuddle: Generating Movement Catalysts for Computer-Aided Choreography, *The Second International Conference on Computational Creativity, (ICCCX)*, ACM Press, 8 pages.
- 2009 **Title:** FCAT Curriculum Innovation Award
Type: Research in Teaching
Organization: FCAT Curriculum Innovation Award, SFU
Details: Performance & Technology collaboration between SIAT and SCA undergraduate students. Mentored by Thecla Schiphorst, Philippe Pasquier and Henry Daniel. Resulted in "Performers In Technology" show performed in Studio D at the Woodward's campus, April 3-4, 2012
- 2006 **Title:** CTIA Honorable Mention Fashion and Futures
Type: Research
Organization: CTIA
Details: Honorable Mention Awarded for contribution to Research in Wearable Technologies
- 2006 **Title:** ITEA Best Demonstration
Type: Research
Organization: Philips, Inc, The Netherlands
Details: Best Technical Demonstration at the ITEA, Paris Symposium for the move.me interactive ambient pillow and soft objects research with V2 in Rotterdam
- 1998 **Title:** PetroCanada Award in New Media for Innovation in New Media Technologies
Type: Research
Organization: Canada Council for the Arts, \$10,000CAD
Details: Awarded Biennially to a Canadian Artist for their contribution to Research and Development in New Media Technologies in the context of Artistic Practice, Awarded for achievements and cross-disciplinary approach to interactive art, dance, computer science and video. <http://www.canadacouncil.ca/news/releases/1999/qx127243889223906250.htm>
- 1997 **Title:** Honorable Mention Media Arts Interface Award for 'immerce' Interactive Exploration of Movement Database
Type: Research Design
Organization: Paris, France
Details: Awarded for CD-Web Based Interface 'immerce' exploring navigation through movement data-base based on Merce Cunningham's choreographic strategies.
- 1997 **Title:** Design School Distinction for Teaching Award
Type: Teaching
Organization: Emily Carr Institute of Art and Design
Details: Awarded by the Dean of the Design School for excellence in teaching based on student projects, reviews and assessment through the School of Design at Emily Carr Institute of Art and Design
- 1996 **Title:** International Digital Media Award (IDMA) for Best Interface
Type: Design
Organization: IDMA - Canada
Details: This award was given to the Interactive CD-Rom/Web Based Interaction entitled "immerce" an exploration of research into navigation techniques of movement based on the archive of Merce Cunningham

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- 1996 **Title:** International Digital Media Award (IDMA) Best Overall
 Type: Design
 Organization: IDMA - Canada
 Details: Best Overall in the Interaction Design Category for the Interactive CD-Rom/Web Based Interaction entitled "immerce" an exploration of navigation based on choreographic techniques accessing the dance archive of Merce Cunningham
- 1996 **Title:** International Digital Media Award (IDMA) People's Favorite
 Type: Design
 Organization: IDMA - Canada
 Details: The People's Favorite award for the Interaction Design Category for the Interactive CD-Rom/Web Based Interaction entitled "immerce" an exploration of navigation based on choreographic techniques accessing the dance archive of Merce Cunningham.
- 1996 **Title:** Graphex Design Award
 Type: Design
 Organization: Graphex Design - Canada
 Details: Graphics Design Award for the Interactive Category based on Screen Designs for Navigation for the Interactive CD-Rom/Web Based piece entitled "immerce" an exploration of an innovative navigation system based on choreographic techniques accessing the dance archive of Merce Cunningham
- 1996 **Title:** Selection for exhibition in 1996 Ars Electronica
 Type: Interactive Arts
 Organization: Ars Electronica
 Details: Selected for International Interactive Arts Exhibition, Ars Electronica 1996
- 1976 **Title:** Academic Scholarship
 Type: Scholarship
 Organization: DPMA - Data Processing Management Association of British Columbia
 Details: Awarded for Academic Achievement - Graduation Award British Columbia Institute of Technology Computer Programming and Systems Analysis
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Research Funding

- Canarie NEP (Network Enabled Platforms) MiddleWare Program (submitted)
 Project Title: M+M (movement + meaning middleware) 2013-2016
 Total funding \$500,000 over 4 years
 Involvement: Principal Investigator
 Co-Investigators: Steve Dipaola, Philippe Pasquier
 Description: Developing research middleware to support a distributed software platform for translating and sharing movement data and its semantic descriptors across multiple platforms, sensor data types, control streams and movement effectors.
- Vice-President Academic SFU
 Project Title: VPA Administrative Support Grant 2013-2016
 Total funding \$100,000 over 4 years
 Involvement: Principal Investigator
 Description: VPA Academic Funding Support for Administrative Assistance for SFU Principle Investigators of International Partnership Grants. To support Project Manager Top-Up Grant.
- SSHRC Institutional Partnership Research Grant. Insight Program 2012 – 2016
 Project Title: Moving Stories: Digital Tools for Movement Meaning and Interaction
 Total funding \$2,350,000 over 5 years
 Involvement: Principal Investigator, Project Leader
 Collaboration: Collaboration between International Partners University of Illinois at Champaign Urbana, Laban Institute of Movement Studies (LIMS), ECUAD, UBC, Credo Interactive, Inc.
 Co-Investigator(s) at SIAT: Philippe Pasquier, Lyn Bartram, Bernhard Riecke, Alissa Antle, Steve Dipaola, Ron Wakkary.

Thecla Schiphorst

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MITACS Accelerate Grant with Reality Controls Inc.

Project Title: Designing a Kinect Camera-Based API to Detect Qualities of Movement to Support Gestural Interaction

Total funding: \$15,000 Oct 2012 – March 2013

Involvement: Principal Investigator, SIAT Faculty Supervisor

Description: PhD Student Aaron Levisohn interning with Reality Controls Inc.

SSHRC Institutional Partnership Research Grant LOI. Insight Program 2011 – 2011

Project Title: Moving Stories: Digital Tools for Movement Meaning and Interaction,

Total funding: \$20,000 over 1 year

Involvement: Principal Investigator, Project Leader

Collaboration: Collaboration between International Partners University of Illinois at Champaign Urbana, Laban Institute of Movement Studies (LIMS), ECUAD, UBC, Credo Interactive, Inc.

Co-Investigator(s) at SIAT: Philippe Pasquier, Lyn Bartram

SSHRC Research Grant. Insight Program 2011 – 2013

Project Title: Mobile Presence: Mediating Cooperative Interaction for Public Urban Screens,

Total funding: \$37,500 over 2 years

Involvement: Principal Investigator

Collaboration: Collaboration between Surrey Art Gallery Urban Screens Project and SIAT

Co-Investigator: Philippe Pasquier

NMI New Media Initiative CCA-NSERC Research Grant Collaboration. 2009 – 2013

Project Title: Meaning from Motion

Total funding: \$470,000 over 3 years

Involvement: Principal Investigator in collaboration with NSERC Scientists

Collaboration: Collaboration between Art & Science in exploring Meaning from Motion including Movement as perception, affect and expression

Co-Investigator(s): Lyn Bartram, Magy Seif El-Nasr

Nokia Industry University Collaboration Grant,

Title: mobile opera

Total funding: \$10,000 January 2008 – June 2008, \$25,000.

Involvement: Principal Investigator

Collaboration: Sang Mah and Doug Tuck at Vancouver Opera

Details: prototyping mobile games spaces for urban street opera performance

SSHRC, Image, Text, Sound and Technology

Title: Immersion & Aesthetics of Interaction

Total funding: 50,000 over 1 year, 2008 (extended to 2 years)

Principle Investigator: Diane Gromala

Involvement: Co-Investigator

Collaboration: with Diane Gromala as principle investigator,

Research Associates: PhD students Jinsil Seo and Gregory Corness

Passepartout, in conjunction with V2_Lab in Rotterdam, Phillips, CWI and TUE

Title: Passepartout

Total Funding: \$100,000 for DEAF07 festival: interact or die June 2005 – July 2007

Involvement: Lead Artist | Designer for V2

Collaboration: V2_Lab, Philips, CWI, TUE faculty and students

Outcomes: soft(n) development, design & exhibition at DEAF07 festival

Nokia Industry University Collaboration Grant

Title: exhale

Total funding: \$15,000 January 2006 – December 2006

Involvement: Principle Investigator

Research Associates: Rob Lovell, Sang Mah

Thecla Schiphorst

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SFU President's Research Grant April 2005

Title: Smart Textiles in Mobile Applications

Total Funding: \$10,000

Involvement: Principle Investigator

Heritage Canada, Networks Grant, Am-I-Able Network Grant)

Title: Pulp Fashion, (part of the Am-I-Able Network Grant)

Total Funding: \$75,000 for whispers research group (Schiphorst Portion)

Involvement: Am-I-Able Researcher

Timeline: 2006-2008

Principle Investigator: Ron Wakkary, Sarah Diamond

Other Researchers in Am-I-Able: Marek Hatala, Joanna Berzowska, Susan Kozel

Other Partners: Banff Centre for the Arts, Concordia University

SFU Discovery Parks SSHRC Fund

Title: Mobile Platforms for gestural interaction

Total Funding: \$10,000

Involvement: Principle Investigator

Timeline: November 2004 to December 2006,

Development of performance systems for mobile platforms and interaction using gestural input

Canarie, ARIM Fund for networked application

Title: "whisper[s]: networked community architectures"

Total Funding: \$200,000

Involvement: Principle Investigator

Timeline: January 2003 – April 2004

Detail: to research wireless connectivity in social applications based in art installation prototyping. funded research and development of production installation <between bodies> exhibition premiere in Bilbao, Spain in April 2004.

Canada Council for the Arts, Media Arts Individual Artist Production Grant,

Title: whisper: wearable body architectures

Timeline: 2002 – 2003

Total Funding: \$60,000

Involvement: Principle Investigator

Detail: to develop an interactive wearable installation for the Dutch Electronic Arts Festival in Rotterdam exhibition date February 2003. Grant funded 2002, amount: \$60,000

British Columbia Arts Media Arts Senior Artist Production Grant

Title: whisper: wearable body architectures

Timeline: 2002 – 2003

Total Funding: \$20,000

Involvement: Principle Investigator

Detail: to develop an interactive wearable installation for the Dutch Electronic Arts Festival in Rotterdam exhibition date February 2003. Grant funded 2002, amount: \$60,000

Canada Council for the Arts, Residency Program for V2-Lab in Rotterdam

Title: whisper: wearable body architectures

Timeline: 2002 – 2003

Total Funding: \$30,000

Involvement: Principle Artist in Residence at V2-Labs

Detail: to develop an interactive wearable installation for the Dutch Electronic Arts Festival in Rotterdam exhibition date February 2003. Grant funded 2002, amount: \$30,000

Daniel Langlois Fondation Artist Grant,

Title: whisper: wearable body architectures, 2002 – 2003

Total Funding: \$40,000

Involvement: Principle Artist in Residence at V2-Labs

Detail: for the research, development and production of whisper: wearable body architectures for the Dutch Electronic Arts Festival in Rotterdam exhibition date February 2003.

Thecla Schiphorst

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Canadian Foundation for Innovation - CFI Infrastructure Grant

Title: Interactivity Lab
Timeline: 2001 - 2003
Total Funding: \$550,000
Involvement: Principle Investigator
Co-Investigators: Ron Wakkary
Detail: for the infrastructure design and implementation of the Interactivity Lab

British Columbia Knowledge Development Fund (Matching Funds for CFI)

Title: Interactivity Lab
Timeline: 2001 - 2003
Total Funding: \$550,000
Involvement: Principle Investigator
Co-Investigators: Ron Wakkary
Detail: for the infrastructure design and implementation of the Interactivity Lab

New Media Innovation Center, Virtual Environments Research Grant

Title: Intentional Grammars: Building Tools for Modeling a Semantics of Caress,
Timeline: 2001 - 2002
Total Funding: \$30,000
Involvement: Principle Investigator
Detail: applying Tactex gestural interface to virtual interface environment.

ASI Strategic University Collaborative Research Grant

Title: Token Spaces
Timeline: 2001 - 2002
Total Funding: \$140,000
Involvement: Principle Investigator
Collaborator: Sid Fels, UBC
Detail: gestural recognition and interaction of touch based on Laban Effort Shape Movement Analysis for application to wearable technologies with Tactex Controls.

SSHRC, INE grant

Title: e-loyalty through experience design
Timeline: 2000 - 2003
Total Funding: \$268,000
Principle Investigator: Diane Cyr
Involvement: Co-Applicant (\$30,000 allotted to work with graduate student)

Canada Council Presentation Distribution Grant for *digital eARTh* (non profit society)

Title: Zero Degree Monstrosities festival and symposium, 2000, \$24K
Timeline: 2000
Total Funding: \$24,000
Involvement: Co-Applicant along with Oliver Hockenhull
Detail: Curatorial Grant to develop net-based artworks and run a festival and symposium

Canada Council Research Grant in Media Arts

Title: "mindblindness" developing 'wearables for the telepathically impaired'
Timeline: 1999
Total Funding: \$30,000
Involvement: Artist Applicant, developing wearable content and infrastructure

Canada Council Research Grant in Media Arts

Title: Travel Grant for Cyberconf8
Timeline: 1999
Total Funding: \$1,000
Involvement: Artist Applicant

Canada Council Presentation Distribution Grant for *digital eARTh* (non profit society)

Title: curatorial grant for the New Materiality: Pleasuring the Immoderate Senses
Timeline: 1998
Total Funding: \$16,000
Involvement: Co-Applicant along with Oliver Hockenhull

Thecla Schiphorst

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Simon Fraser University

Detail: Curatorial Grant to develop net-based artworks and run a festival and symposium

British Columbia Arts Media Arts Senior Artist Production Grant

Title: felt histories

Timeline + Total Funding: \$10,000, 1997

Involvement: Principle Investigator

Detail: New Media Grant for Video Production for Felt Histories: an interactive computer based installation using touch and motor control systems

Canada Council: New Media Grant

Title: felt histories:

Timeline + Total Funding: \$45,000, 1997

Involvement: Principle Investigator

Detail: New Media Grant to produce Felt Histories: an interactive computer based installation using touch and motor control systems

Canada Council Travel Grant in Media Arts

Title: Siggraph'97 in Los Angeles to exhibit interactive artwork in the Electric Garden

Timeline + Total Funding: \$1,000, 1997

Involvement: Artist Applicant

Canada Council Presentation Distribution Grant for *digital eARTh* (non profit society)

Title: Transverse Worlds: a web-based community art project

Timeline + Total Funding: \$16,000, 1997

Involvement: Co-Applicant along with Oliver Hockenhull

Detail: Curatorial Grant to develop net-based artworks and run a festival and symposium

Canada Council: Computer Integrated Media grant

Title: Bodymaps: artifacts of Touch

Timeline + Total Funding: \$35,000, 1996

Involvement: Principle Investigator

Detail: to develop an interactive computer based audio video installation using touch, video and interactive audio, to be presented at a Solo Exhibition at the Western Front

Canada Council Travel Grant in Media Arts

Title: Ars Electronica 1996 Exhibition of Bodymaps

Timeline + Total Funding: \$2,000, 1996

Involvement: Artist Applicant

Canada Council Presentation Distribution Grant for *digital eARTh* (non profit society)

Title: Ecology of Communication

Timeline + Total Funding: \$16,000, 1996

Involvement: Co-Applicant along with Oliver Hockenhull

Detail: Curatorial Grant to develop net-based artworks and run a festival and symposium

Centre for Image and Sound Research

Title: immerce: multi-media exploration of Merce Cunningham Archive

Timeline + Total Funding: \$25,000, 1993-94

Involvement: Principle Investigator

Detail: develop and produce interactive navigation front-end to data-base material

Canada Council: Computer Integrated Media Research grant

Title: Research to explore Motion Capture input to Lifeforms

Timeline + Total Funding: \$30,000, 1992

Involvement: Principle Investigator

Detail: to develop a motion capture front-end to lifeforms for interactive performance

External Affairs Canada: Touring Grant for Interactive Performance

Title: Escape: Interactive Performance with Voice Input to moving Lights & Sounds

Timeline + Total Funding: \$30,000, 1991

Involvement: Principle Investigator

Detail: to tour *Escape*: Interactive Performance with Voice Input to moving Lights & Sounds to ISEA 1992 Sydney Australia

Thecla Schiphorst

Associate Professor, School of Interactive Arts & Technology
Simon Fraser University

International Project Activity

Project Title: movingStories
Country of Project: Canada, USA
Affiliated Institution(s): UIUC NCSA at Champaign Urbana, LIMS (Laban Institute of Movement Studies), ECUAD, UBC Theater, Credo
Resarchers: Thecla Schiphorst, Guy Garnett, Donna Cox, Karen Bradley, Karen STudd
Role in Project Research
Funding Agency: SSHRC Institutional Partnership Grant
Start Date (Month and Year): May 2012
End Date (Month and Year): April 2015

Project Description: Research in movement interaction for developing digital tools for movement meaning and interaction

Project Title: move.me (smart fabrics research in flexible displays, emissive textiles)
Country of Project: USA, Tempe Arizona
Affiliated Institution(s): Flexible Display Centre, Arizona State University, Interactivity Lab SFU
Resarchers: Dr Ghassan Jabbour, Thecla Schiphorst
Role in Project Research
Funding Agency: SFU; President's Research Grant
Start Date (Month and Year): April 2005
End Date (Month and Year): April 2007

Project Description: Research in garments, smart textiles, and flexible electronics and displays is a new and fast growing research domain that intersects textile and materials research, user interaction and HCI. This research applies research in smart fabrics and material engineering to wearable technologies and garment design as applied to ongoing research of the whisper[s] research group.

Project Title: <passepourtout>
Country of Project: The Netherlands
Affiliated Institution(s): V2-Lab Rotterdam, CWI (Amsterdam), TUE, Phillips Research
Role in Project Research
Funding Agency: Frame 6 EU Funding, Nokia, Canada Council
Start Date (Month and Year): April 2005
End Date (Month and Year): April 2007

Project Description: **Passepourtout: Coupling Scalable Media to Ambient Experience**
By bringing elements of the home and personal environment under the control of networked media, these can become more reactive to viewers' wishes in presentation. This will result in bringing greater pleasure, emotion and direct experience into content. At the same time, managing and influencing the content enjoyed by a group/family, or participation in the process, is a much greater need then ever before. The Passepourtout project brings the elements of European CE Industry together with Innovators in content creation and design, to unleash the potential of reactive content in an ambient experience.

The participation of V2_Lab in the Passepourtout project signals a trajectory where artistic inquiry can lead research in this area. V2_ is interested in bringing the framework of artistic practice as a mechanism for designing within the Passepourtout project. V2_ is working in parallel and together with other Passepourtout partners in conceptualizing, modeling, prototyping, implementing, testing and iterating projects for and with other Passepourtout partners. V2_ has selected the artist, Thecla Schiphorst to lead the V2 lab team in this process. The V2 internal project names for this work is move.me, and soft(n)

Thecla Schiphorst

Associate Professor, School of Interactive Arts & Technology
Simon Fraser University

Service to Simon Fraser University

SIAT Departmental Committees

Associate Director, SIAT		September 2011 – August 2014
Undergraduate Curriculum Committee	Chair	September 2012 – August 2013
Infrastructure Committee	Chair Member	September 2011 – December 2012 September 2005 – August 2006
Graduate Admissions Committee	Chair Member	September 2008 to August 2010 September 2005 - June 2007
SIAT Hiring Committee • Media Design Lecturer Position • Games Assistant Professor Tenure Track Position • VA Assistant Professor Tenure Track Position	Member	September 2011 - present
Review, Tenure & Promotion Committee	Member Member	September 2011 – May 2013 May 2005 – April 2007
SIAT Hiring Committee	Member	September 2011 - current
Graduate Program Committee	Member	September 2008 to August 2010 September 2005 – June 2006 May 2002 – September 2006
Advisory Committee to the Director	Member	September 2005 – present
Infrastructure (Laboratories and Facilities) Committee	Member	September 2005 – present
Governance Committee	Member	September 2005 – August 2007
CFI Interactivity Lab	Director	May 2002 – August 2005
PMA Stream task group for Undergraduate Curriculum	Coordinator	August 2003 – January 2004

FAS Faculty Committees

SIAT Wave III Hiring Committee	Member	April 2006 – January 2007
SIAT Wave II Hiring Committee	Member	April 2003 – January 2005
SIAT Director Search Committee	Member	May 2002 – September 2003
UCrack: Undergraduate Curriculum Revision Committee	Member	June 2006 – October 2006

Simon Fraser University Committees

CFI Leading Edge Fund Grant Committee	Member	October 2005 – December 2005
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Thecla Schiphorst

Associate Professor, School of Interactive Arts & Technology
Simon Fraser University

Active Service to the Academic Community – Conference Chairing

CHI 2014	Student Design Chair	2013-2014
TEI 2014	Art Track Chair	2013-2014
CHI 2013	Student Design Chair	2012-2013
TEI 2012	Art Track Chair	2011-2012
CHI 2012	Student Design Chair	2011-2012
TEI 2010	Art Track Chair	2009-2011

Active Service to the Academic Community – Reviewing

Goldsmith College, Intimacy Conference	Selection Committee	Fall 2007
Leonardo Journal of ISAST	Journal Reviewer	May 2007
Dutch Electronic Arts Festival (DEAF06)	Expert Consultant	DEAF07 festival concept committee January 2006
Elsevier Press	Journal Reviewer	Transactions of Human Computer Interaction
Tangible and Embedded Interfaces Conference	Paper Reviewer	2006, 2007, 2008, 2010, 2011, 2012
Creativity and Cognition Conference	Paper Reviewer	2006, 2007, 2009, 2011, 2013
Canada Council for the Arts	Jury Member	Dance on Screen Program, 2005
Canada Council for the Arts [AIRES Program]	Jury Member	Canada Council and NRC [National Research Council Residence Program October 2003, Ottawa
Canada Council for the Arts	Advisory Member Advisory Committee on Policies for Collaboration in Funding with SSHRC, NSERC, NRC, July 2003, Ottawa	
Vancouver Art Gallery	Advisory Member Advisory Community member for Cyborg Exhibition, 2002	
Theatre Journal of Canada	Referee	Theatre Journal of Canada
MIT Press	Referee	Book Publication Request
Rennsselar Polytechnic Institute	External Assessor	Tenure Track Appointment
UIST (User Interface Software and Technology)	Reviewer	Full paper reviewer
British Columbia Festival of the Arts	Advisory Committee	Committee Member 2002
Festival de Nouveau Danses	Jury member	Monaco Danses Festival Selection Committee, June 2000
Siggraph 2000	Jury member	Art Gallery selection committee, 2000
Vancouver Electronic Arts Festival	Programming Committee	Zero Degree Monstrosities, digital eARTh, Vancouver, 2000
ISEA, International Symposium for Electronic Arts	Board Member	ISEA Board, 1998-2001
Vancouver Dance Centre	Board member	Vancouver Dance Centre, 1998-1999

Thecla Schiphorst

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Simon Fraser University

Siggraph 1998	Chair	Art & Design Sketches Committee 1998
Siggraph 1997	Jury member	Art & Design Sketches Committee 1997
BC Arts Council	Jury Member	Film and Video Jury 1996
Vancouver Electronic Arts Festival (Body Electric)	Programming Committee	BodyElectric, VEAF 1996
Images du Futur	Jury member	Computer Animation Competition 1995
Canada Council For the Arts	Jury member	Interdisciplinary Performance Art 1993
Conference on Dance and Technology	Conference Chair	Second Annual Conference on Dance and Technology Simon Fraser University July 1993

Membership in the Academic Community

ACM member, IEEE member