

# HISTORY 4F31

## Virtual Worlds and the Discipline of History

### Fall 2012/Winter 2013

**Professor:** Dr. John Bonnett  
**Office:** GLN 249  
**Phone:** (905) 688-5550 x5552  
**E-mail:** jbonnett@brocku.ca

**Time:** Thursdays, 17:00-20:00  
**Place:** Thistle 269H  
**Office Hours:** Thursdays, 16:00-17:00  
or by appointment



### Course Description:

This course is the product of a simple realization: computation is presenting people – you, me and, well, pretty well everyone – with new ways to express themselves. These new methods I call “expressive instruments.” There is nothing particularly difficult about the idea of of expressive instrument. A letter is an expressive instrument. A number is an expressive instrument. So are the things that are generated by computers, like audio files, 2D animations and 3D models that move. Users often turn to computer created expressive instruments because they are easier and more efficient to generate than alternates created by different instruments, such as the typewriter or pen. For our purposes, they are important for two reasons. The first is that computer-generated expressive forms have led to the creation of something new: new platforms. The term “platform” is an easy idea to grasp too. It is simply a container that houses content. By that measure, a book is a platform. It houses content in the form of letters and numbers. Books, however, are not designed to house digital objects produced by computers, and so computer scientists, digital humanists and

others have been busy working over the past two decades to design new platforms to house them. These platforms are known by many names, but for our purposes we will call them Virtual Worlds. Digital expressive instruments are also important to us because they – and Virtual Worlds – are having an impact on how historians express the past, interpret the past, and teach the past. The purpose of this course is to learn how.

## Required Textbooks:

### Available in Bookstore

Bodenhamer, David J, Corrigan, John and Trevor M. Harris. Eds. *The Spatial Humanities: GIS and the Future of Humanities Scholarship*. Bloomington, IN: Indiana University Press, 2010. ISBN: 0253222176.

Hillier, Amy and Anne Kelly Knowles. Eds. *Placing History: How Maps, Spatial Data, and GIS Are Changing Historical Scholarship*. Redlands, CA: ESRI Press, 2008. ISBN: 1589480139.

Iggers, Georg. *Historiography in the Twentieth Century*. Vancouver, BC: UBC Press, 2005. ISBN: 0819567663.

Gaddis, John Lewis. *The Landscape of History*. New York: Oxford University Press, 2004. ISBN: 0195171578.

## Assignments:

The final mark for this seminar is based on successful completion of three written papers; one oral PowerPoint presentation (20 minute) based on your second essay; generation of a partial or complete 3D model of a historic building using *VectorWorks* and class participation.

## Papers:

Written assignments for the first and second papers are to be the individual work of each student. No collaboration is permitted in the research or composition of the first two written papers for this course. The same rule applies for the oral PowerPoint presentation. The research, composition and presentation of the assignment are to be the product of your work, and your work

alone. Students can and will collaborate in the production of the third and final paper for this course, and the 3D model that is submitted with it.

### **Paper One:**

**The first paper will be due at the start of final class for the fall semester: November 22, 2012.** It should be 10 pages. (Please note that your paper should be 10 pages of written text, double spaced. The title page, endnotes and bibliography are not counted as part of the 10 pages you are required to submit). Your assignment for this paper will be to write a literature review. For your paper, select one of the two topics listed here. Select 12 papers from the sources listed under each topic, and write the essay.

- **Topic One:** Overview of Digital History
  - "Essays on History and New Media" at *Center for History and New Media Website*. [Use papers in the "Overviews" section]. <http://chnm.gmu.edu/essays-on-history-new-media/essays> [September 6, 2012]
  - "Essays" at *Digital History Website*. [Use any papers listed]. <http://digitalhistory.unl.edu/essays.php> [September 6, 2012].
  - "Intersections: History and New Media" at *Perspectives Online Website*. [Use any papers listed in "Intersections: History and New Media" section]. <http://www.historians.org/Perspectives/issues/2009/0905/> [September 6, 2012].
  
- **Topic Two:** History Teaching Using Digital Media
  - "Essays on History and New Media" at *Center for History and New Media Website*. [Use papers in "Teaching Digital History" section]. <http://chnm.gmu.edu/essays-on-history-new-media/essays> [September 6, 2012].

- "Intersections: History and New Media" at *Perspectives Online Website*. [Use any papers relating to teaching in "Intersections: History and New Media" section].  
<http://www.historians.org/Perspectives/issues/2009/0905/>  
[May 10, 2010].

### **Paper Two:**

**Your second paper will be due the start of class on February 14, 2013.** The essay will be 10 pages in length. (Again, 10 pages of written text. The title page, endnotes and bibliography are not counted as part of the 10 pages you are required to submit). Each will be based on 10 to 15 papers. The eligible topics and resources for this paper are listed on the final section of this syllabus.

### **Paper Three:**

**Your third and final paper will be due at the start of the last class of winter semester, April 4, 2013.** It will be 20 pages of written work, plus your title page, endnotes and bibliography. For this assignment, you will pair up with another member of the class, and the two of you together will be responsible for doing two things: generating a 3D model of a building situated here in St. Catharines; submitting an essay that describes the history of that building between 1873 and 1914. For this assignment, you will be marked on three things:

- **Creation and adherence to a work plan (30 %)** – To complete this assignment, you will need to make a work plan, and stick to it. You will need to determine what local repositories you will visit, such as the St. Catharines Museum, and when you will visit them. I will expect constant reports over the course of the winter semester apprising me of your progress. My receipt of a work plan at the start of winter semester, and receipt of reports in association with each benchmark, will form the basis of this portion of your mark
- **Description of method used to construct 3D model (30 %)** – The first 10 pages of your essay will be devoted to the model you submit with your essay. Your job will be to describe in detail the assumptions and steps you took to create your model. You will further be required to provide documentation, i.e. to show me the primary sources you used to create your model. I will want an account of every step you took to generate the model you present in conjunction with the paper
- **Analysis that places the modeled building in context (40 %)** – In the final 10 pages of your assignment, you will need to provide an account of the building's history. Here you will need to provide an account of the structure's history,

indicating when it was built, and providing the names of the residents or businesses associated with the structure between 1873 and 1914. You will also be responsible for tying the building to a historical context or set of contexts. You will have wide latitude here. The context could be a significant person. It could be a significant event such as the Long Depression. It could be a domain of commercial activity such as Dry Goods or Music. Or it could be something else if your sources point in that direction

As is the case with any essay, your mark for this and all essays will also be based on your meeting the core requirements for any good expository essay: good argumentation, grammar and documentation of your primary and secondary sources.

### **Oral Presentation:**

As indicated above, your 20 minute oral PowerPoint presentation will be based on the research you do for your second paper. Student presentations will take place during the final three sessions of the course, starting March 21, 2011 until the end of the semester. After the course has started, I will assign each student a date for his or her presentation.

### **3D Model:**

Your final assignment is the generation of a 3D model. You will work in teams to construct the 3D model which you will submit with your fourth paper. In this course, you will be provided with instructions regarding the interpretation of primary sources – specifically fire insurance maps and photographs – and use of the 3D modeling software program *VectorWorks*. Your mark for this section will be based on two things:

- Submission of a partial or completed 3D model at the end of the course. You will receive full marks for a completed model, and partial marks for a partial model.
- Completion of the *3D Virtual Buildings Tutorial* up to Part L by February 14, 2013. After Reading Week, we will no longer spend time working on the tutorial. Instead, our focus as a class will be on research and generating the model for your final paper. On the 14<sup>th</sup>, I will ask you to e-mail me the model you've created through the tutorial, and to indicate what section you are currently situated. If you've completed the model, you will receive full marks for this section of your total mark. If you've completed a portion of the tutorial, I will prorate your mark based on your progress to date.

The *3D Virtual Buildings* tutorial can be accessed at this URL:

<http://www.brocku.ca/3DVirtualBuildings/Title/Title.html>

### **Classroom Discussion:**

In class, you will be expected to have completed all assigned readings for the given session. This is a seminar course, and the success of a given seminar stands or falls on the quality of the discussion and the engagement of its participants. Hence, it is very important that you complete the readings, and more to the point, that you think about them. Plan on coming to class with something to say.

Each class, a member of the class will also be responsible for providing a five minute summary of the argument and content for one of the week's readings. He or she will also be responsible to lead the class in discussion for 10 minutes. You will be required to pose two questions to your colleagues in class. I will join the discussion after these two questions have been discussed.

Your classroom participation mark will be based on the following:

- Your individual article summaries, how well you encapsulate an article's argument and main points for your fellow class members
- Your subsequent leadership of the classroom discussion
- Your attendance and participation each week in group discussions of a given reading

Each week after class I will email an assignment list indicating the names of the individuals responsible for leading class discussion the following week. The list will also indicate the name of the article(s) or book chapters(s) that the discussion leader is responsible for.

<b>Evaluation:</b>
--------------------

Oral Seminar: 1 x 10 =	10 %
Written Essays: (2 x 10) + (1 x 25) =	45 %
Class Participation: 1 x 25 =	25 %
3D Model: (1 x 10) + (1 x 10) =	20 %

## Deadlines:

Deadlines are firm. In rare circumstances, I will grant an extension, but it must be requested at a minimum the day before the paper is due. If you were unable to submit the paper on time due to illness, you will need to submit a note from your physician indicating that you were sick.

Otherwise, papers submitted after deadlines will receive a 5% reduction in mark for every day that they are late.

## Format and Documentation:

Papers presented in this course should be double-spaced, with 12 point font. The pages of your essays should be numbered. Your paper should have a title page indicating the title of your paper, your name, the number for this course (HIS 4F30), my name as your professor, the name of the university, and date of submission.

Students are required to provide proper documentation with their written assignments. If you use content, you are obliged to identify for your readership – which in this case is me – the source of your content, via endnotes.

All works cited should be listed in a bibliography at the end of your paper.

And all works cited should be properly documented via the Chicago/Turabian format. Parenthetical forms of documentation are not accepted in this course. Those who either need to learn or brush up on this style of documentation can consult “The Writing Center” website on-line:

<http://www.wisc.edu/writing/Handbook/DocChicago.html>

Plagiarism will not be tolerated. The complete definition of plagiarism is located in the *Brock University 2012/13 Undergraduate Calendar*. Important points from that definition include:

- Submission of an essay written in whole or in part by someone else as one’s own.
- Preparing an essay or assignment for submission by another student
- Copying an essay or assignment, or allowing one’s essay or assignment to be copied by someone else.
- Using direct quotations or larger sections of paraphrased material without acknowledgement.

Plagiarism  
Policy

See page 30  
Brock  
University  
Undergraduate  
Calendar

Students caught plagiarizing or cheating will be subject to penalties outlined in the university calendar.

It is assumed that by the time students reach a fourth year level course that they know proper standards for documentation. If you have any questions regarding documentation and proper scholarly practice, please do not make the mistake of assuming that a given practice will be acceptable to me or the university. Ask me. I'll either answer you right away, or retrieve an answer from the university. All submitted essays are subject to computerized methods of plagiarism detection such as turnitin.com.

## Seminar Topics:

### September 6: Course Introduction – Introduction to 3D Modelling Software: *VectorWorks*

No readings. This class will start with an introduction to the course. It will conclude with an introductory tutorial to the course's 3D Modelling software: *VectorWorks*.

### September 13: 20<sup>th</sup> Century Historiography I

Georg Iggers. *Historiography in the Twentieth Century*. Vancouver, BC: UBC Press, 2005. pp. 1-77

### September 20: 20<sup>th</sup> Century Historiography II

Georg Iggers. *Historiography in the Twentieth Century*. Vancouver, BC: UBC Press, 2005. pp. 78-149.

### September 27: 20<sup>th</sup> Century Historiography III

John Lewis Gaddis. *The Landscape of History*. New York: Oxford University Press, 2002. pp. 1-70.

### October 4: 20<sup>th</sup> Century Historiography IV

John Lewis Gaddis. *The Landscape of History*. New York: Oxford University Press, 2002. pp. 71-152.



## October 11: Overview: Introduction to Digital History

Anderson, Ian. "History and Computing." At *Making History: The Changing Face of the Profession in Britain*. Website at: [http://www.history.ac.uk/makinghistory/resources/articles/history\\_and\\_computing.html](http://www.history.ac.uk/makinghistory/resources/articles/history_and_computing.html) [September 6, 2012].

Ayers, Ed. "Technological Revolutions I have known." In *Computing in the Social Sciences and Humanities*. (Chicago: University of Illinois Press, 2001.): 19-28.

Cohen, Daniel, et al. "Interchange: The Promise of Digital History." In *The Journal of American History*. 95(2): 442-451. September 2008. Available on-line at:

<http://www.journalofamericanhistory.org/issues/952/interchange/index.html> [September 6, 2012].

Katz, Stanley N. "Why technology matters: the humanities in the twenty-first century." In *Interdisciplinary Science Reviews*. 30(2): 105-118.

Lutz, John. "Riding the Horseless Carriage to the Computer Revolution: Teaching History in the Twenty-First Century." *L'histoire sociale/Social History*. 34 (68): 427-436. November 2001.

Seefeldt, Doug and William G. Thomas. "What is Digital History?: A Look at Some Exemplar Projects." in *Perspectives on History*. 47(5). May 2009. Available on-line at: <http://www.historians.org/Perspectives/issues/2009/0905/0905for8.cfm> [September 6, 2012].

## October 18: Data Mining, Text Mining and Quantitative History

Cameron, Sonja and Sarah Richardson *Using Computers in History*. (New York: Palgrave Macmillan, 2005): 135-153

On Reserve

Cohen, Daniel. "From Babel to Knowledge: Data Mining Large Digital Collections." In *D-Lib Magazine*. 12(3). March 2006. Available on-line at:

<http://dlib.org/dlib/march06/cohen/03cohen.html>

[September 6 2012]

Crane, Gregory. "What Do You Do with a Million Books?" in *D-Lib Magazine*. 12(3). March 2006. Available on-line at:

<http://dlib.org/dlib/march06/crane/03crane.html> [September 6, 2012]

Fogel, Robert and Geoffrey Elton. *Which Road to the past?: Two Views of History*. New Haven: Yale University Press, Pp. 5-70.

On Reserve

Grossman, James. "“Big Data’: An Opportunity for Historians?” in *Perspective on History*. March 2012. Available online at:

[http://www.historians.org/perspectives/issues/2012/1203/Big-Data\\_An-Opportunity-for-Historians.cfm](http://www.historians.org/perspectives/issues/2012/1203/Big-Data_An-Opportunity-for-Historians.cfm) [September 6, 2012]

The Stone and the Shell Blog. "Where to start with text mining." Available on-line at:

<http://tedunderwood.wordpress.com/2012/08/14/where-to-start-with-text-mining/> [September 6, 2012]

The Stone and the Shell Blog. "Why humanists need to understand text mining." Available on-line at:

<http://tedunderwood.wordpress.com/2011/06/29/why-humanists-need-to-understand-text-mining/> [September 6, 2012].

## October 25: The Science of Complexity and Emergent Change

Waldrop, M. Mitchell. *Complexity: The Emerging Science at the Edge of Order and Chaos*. (New York: Touchstone Books, 1992).

- Introduction and Chapter One, pp. 9-51.
- Chapter Three, pp. 99-135
- Chapter Six, pp. 198-240.

## November 1: Visualization, Agent-Based Modeling and Historical Change I



Lansing, J. Stephen. “‘Artificial Societies’ and the Social Sciences.” In *Artificial Life*. 8:272-292. 2002.

Rauch, Jonathan. “Seeing Around Corners.” In *The Atlantic Monthly*. April 2002.

Staley, David. *Computers, Visualization and History*. Armonk: NY: M.E. Sharpe, 2003.

- Chapter 2: "Visualization As an Alternative to Prose." Pp. 35-57.

Trautteur, G.; Virgilio, R. “An agent-based computational model for the Battle of Trafalgar: a comparison between analytical and simulative methods of research.” In *Enabling Technologies: Infrastructure for Collaborative Enterprises, 2003. WET ICE 2003. Proceedings. Twelfth IEEE International Workshops*. 9-11 June 2003  
Page(s): 377 – 382

Weinstein, Fred. “Psychohistory and the Crisis of the Social Sciences.” In *History and Theory*. 34 (December 1995): 299-319.

## November 8: Visualization, Agent-Based Modeling and Historical Change I

Coven, Robert and Meghan Manfra. “History is Not a Spectator Sport: Reengaging Students through Modeling.” *Modeling in the Humanities* Website. Available on-line at

<http://www.connectinghistory.org/mith/?p=25> [September 6, 2012].

Graham, Shawn. “Behavior Space: Simulating Roman Social Life and Violence.” In *Digital Studies*. 1(2). Available on-line at:

[http://www.digitalstudies.org/ojs/index.php/digital\\_studies/article/view/172/214](http://www.digitalstudies.org/ojs/index.php/digital_studies/article/view/172/214) [September 6, 2012].

Manfra, Meghan and Robert M. Coven. “A Digital View of History: Drawing and Discussing Models of Historical Concepts.” In *Social Education*. 75(2): 102-106

McCall, Jeremiah. "Historical Simulations as Problem Spaces: Criticism and Classroom Use." In *Journal of Digital Humanities* 1(2). Available on-line at:

<http://journalofdigitalhumanities.org/1-2/historical-simulations-as-problem-spaces-by-jeremiah-mccall/> [September 6, 2012].

## November 15: History and Computing Gaming I

Campion, Martin C. "A Historian and his Games." In *Simulation and Gaming*. 26(1995): 168-178.

Champion, Erik. "Heritage Role Playing – History as an Interactive Digital Game." Interactive Entertainment Workshop, Sydney, NSW, Australia. February 2004. Conference Paper. School of Information Technology and Electrical Engineering Publications. Available on-line at:

[http://espace.library.uq.edu.au/eserv/UQ:9483/Heritage\\_Role\\_Pl.pdf](http://espace.library.uq.edu.au/eserv/UQ:9483/Heritage_Role_Pl.pdf) [September 10, 2009]

McMichael, Andrew. "PC Games and the Teaching of History." In *The History Teacher*. 40(2): 203-218.

Squire, K. and S.A. Barab, S.A. (2004). *Replaying history*. Paper published in the proceedings of the 2004 International Conference of the Learning Sciences. Los Angeles: UCLA Press.

Available on-line:

<http://website.education.wisc.edu/kdsquire/manuscripts/icls2004/icls-civ3.doc> [September 10, 2009]

## November 22: History and Computer Gaming II

Antley, Jeremy. "Games and Historical Narratives." In *Journal of Digital Humanities*. 1(2). Available on-line at:

<http://journalofdigitalhumanities.org/1-2/games-and-historical-narratives-by-jeremy-antley/> [September 6, 2012]

Chapman, Adam. "Privileging Form Over Content: Analysing Historical Videogames." In *Journal of Digital Humanities*. 1(2). Available on-line at:

<http://journalofdigitalhumanities.org/1-2/privileging-form-over-content-by-adam-chapman/> [September 6, 2012]

Clyde, Jerremie, Hopkins, Howard and Glenn Wilkinson.  
“Beyond the ‘Historical’ Simulation: Using Theories of History to Inform Scholarly Game Design.” In *Loading... The Journal of the Canadian Game Studies Association*. 6(9): 3-16. Available on-line at:

<http://journals.sfu.ca/loading/index.php/loading/article/view/105/122> [September 6, 2012].

Kee, Kevin, Graham, Shawn, Lutz, John and Pat Dunae.  
“Towards a theory of good history through gaming.” In *The Canadian Historical Review* 90: 303-326.

## **November 29, December 6, 13, 20, 27, January 3: Exams and Christmas Break**



## **January 10: Constructivist Learning, Computing and History**

Bonnett, John. “Following in Rabelais’ Footsteps: Immersive History and the 3D Virtual Buildings Project.” In *Journal of the Association for History and Computing*. 6(2). September 2003.  
Available on-line at:

<http://hdl.handle.net/2027/spo.3310410.0006.202> [September 6, 2012]

Calandra, Brendan and John Lee. “The digital history and pedagogy project: Creating an interpretive/pedagogical historical website.” In *Internet and Higher Education* 8(2005): 323-333.

Jonassen, David H., and Chad S. Carr, “Mindtools: Affording Multiple Knowledge Representations for Learning,” Susanne P.

Lajoie, ed., in *Computers as Cognitive Tools, Volume II: No More Walls* (Mahwah, NJ: Lawrence Erlbaum Associates): 165-196.

Kafai, Yasmin and Mitchel Resnick, Eds. *Constructionism in practice: designing, thinking, and learning in a digital world*. Mahwah, N.J. : Lawrence Erlbaum Associates, 1996.

- Introduction -- Yasmin Kafai and Mitchel Resnick, "Introduction," pp. 1-8
- Chapter One -- Seymour Papert, "A Word for Learning," pp. 9-24

## **January 17: New Platforms, New Repositories for History: 3D Virtual Worlds, Cyberinfrastructure, Grid Computing and High-Performance Computing**

Bonnett, John. "Computer-Supported Collaborative Work and the Historian's Craft." 2005 Meeting of the Canadian Historical Association. Congress of the Social Sciences and Humanities. University of Western Ontario. London, ON. June 1, 2005.

Borgman, Christine L. *Scholarship in the Digital Age: Information, Infrastructure, and the Internet* (Cambridge, MA: MIT Press, 2007): 1-32; 75-114.

Shifflett, Crandall. "Seeing the Past: Digital History as New Model Scholarship." In *MERLOT: Journal of Online Learning and Teaching*. Available on-line at:

<http://jolt.merlot.org/vol3no1/shifflett.pdf> [September 6, 2012]

## **January 24: New Platforms, New Repositories for History: 3D Virtual Worlds, Cyberinfrastructure, Grid Computing and High-Performance Computing**

Ayers, Ed. "Turning toward Place, Space, and Time." In *The Spatial Humanities: GIS and the Future of Humanities Scholarship*. Eds. David J. Bodenhamer, John Corrigan and Trevor M. Harris (Bloomington, IN: Indiana University Press, 2010.): 1-13.

Bodenhamer, David. "The Potential of Spatial Humanities." In *The Spatial Humanities: GIS and the Future of Humanities Scholarship*. Eds. David J. Bodenhamer, John Corrigan and Trevor M. Harris (Bloomington, IN: Indiana University Press, 2010.): 14-30.

Harris, Trevor M., Rouse, Jesse and Susan Bergeron. "The Geospatial Semantic Web, Pareto GIS, and the Humanities." In *The Spatial Humanities: GIS and the Future of Humanities Scholarship*. Eds. David J. Bodenhamer, John Corrigan and Trevor M. Harris (Bloomington, IN: Indiana University Press, 2010.): 124-142.

Harris, Trevor M., Corrigan, John and David J. Bodenhamer. "Challenges for the Spatial Humanities: Toward a Research Agenda." In *The Spatial Humanities: GIS and the Future of Humanities Scholarship*. Eds. David J. Bodenhamer, John Corrigan and Trevor M. Harris (Bloomington, IN: Indiana University Press, 2010.): 167-176.

## January 24: Historical G.I.S. I

Goodchild, Michael. "Social Sciences: Interest in GIS Grows." In *ArcNews*. 26(1): 1, 3. Spring 2004.  
Available on-line at:

<http://www.esri.com/news/arcnews/spring04articles/social-sciences.html> [September 6, 2012]

Gregory, Ian N. and Paul S. Ell. "GIS and its role in historical research: an introduction." In *Historical GIS: Technologies, Methodologies and Scholarship*. (Cambridge, UK: Cambridge University Press, 2007): 1-20; 119-144.

Knowles, Anne Kelly. "GIS and History." In *Placing History: How Maps, Spatial Data, and GIS are Changing Historical Scholarship*. Ed. Anne Kelly Knowles. (Redlands, CA: ESRI Press, 2008): 1-26.

Ray, Benjamin C. "The horrid calamity which, plague-like, spread': Understanding the Salem witch trials as a Social Epidemic." Unpublished Paper. Available on-line at:

[http://pages.shanti.virginia.edu/2010\\_02\\_MDST3703/files/2010/02/Microsoft-Word-Salem.pdf](http://pages.shanti.virginia.edu/2010_02_MDST3703/files/2010/02/Microsoft-Word-Salem.pdf) [September 6, 2012].

## January 31: Historical G.I.S. II

Bodenhamer, David. "History and GIS: Implications for the Discipline." In *Placing History: How Maps, Spatial Data, and GIS are Changing Historical Scholarship*. Ed. Anne Kelly Knowles. (Redlands, CA: ESRI Press, 2008): 151-178.

Churchill, Robert and Amy Hillier, "Teaching with GIS." In *Placing History: How Maps, Spatial Data, and GIS are Changing Historical Scholarship*. Ed. Anne Kelly Knowles. (Redlands, CA: ESRI Press, 2008): 61-94.

Cunfer, Geoff. "Scaling the Dustbowl." In *Placing History: How Maps, Spatial Data, and GIS are Changing Historical Scholarship*. Ed. Anne Kelly Knowles. (Redlands, CA: ESRI Press, 2008): 95-122.

Knowles, Anne Kelly et. al. "Conclusion: An Agenda for Historical GIS." In *Placing History: How Maps, Spatial Data, and GIS are Changing Historical Scholarship*. Ed. Anne Kelly Knowles. (Redlands, CA: ESRI Press, 2008): 235-266.

## February 7: Computing and Archaeology I

Beacham, R.; H. Denard and Niccolucci, F. 2006, 'An Introduction to the London Charter', in Ioannides, M. *et al.* (eds), *The e-volution of Information Communication Technology in Cultural Heritage: where hi-tech touches the past: risks and challenges for the 21st century*, Short papers from the joint event CIPA/VAST/EG/EuroMed, Budapest: Archaeolingua.

Available on-line at:

[http://www.londoncharter.org/fileadmin/templates/main/docs/london\\_charter\\_2\\_1\\_en.pdf](http://www.londoncharter.org/fileadmin/templates/main/docs/london_charter_2_1_en.pdf) [September 12, 2012]



Favro, Diane. "The digital disciplinary divide: reactions to historical virtual reality models," in *Rethinking architectural historiography*, Dana Arnold et al, eds., Routledge 2006, 200-14.

Goodrick, G. and Gillings, M., 2000 "Construct, simulations and hyperreal worlds: the role of Virtual Reality (VR) in archaeological research." In G. Lock and K. Brown (eds.) *On the Theory and Practice of Archaeological Computing*, Oxford University Committee for Archaeology monograph 51. Oxford: Oxbow Books.

Kanter, John. "Realism Vs. Reality: Creating Virtual Reconstructions of Prehistoric Architecture." In *Virtual Reality in Archaeology*. Eds. Juan A. Barcelo, Maurizio Forte and Donald H. Sanders. Oxford: Archaeopress, 2000. BARS International Series 843. pp. 47-52.

Available on-line at:

<http://www.sarweb.org/kantner/SAA00/index.html>  
[September 12, 2012]

## February 14: Computing and Archaeology II

On Reserve

Paper  
Two  
Due

Frischer, B. et al., 2002. "From CVR to CVRO. The Past, Present, and Future of Cultural Virtual Reality," by B. Frischer, F. Niccolucci, N. Ryan, J. Barcelò, *Proceedings of VAST 2000*, ed. F. Niccolucci, *British Archaeological Reports* 834 (ArcheoPress, Oxford) 7-18.

Available on-line at:

<http://www.cvrlab.org/research/images/CVR%20to%20CVRO.pdf> [August 22, 2007]

Jones, Martin. *The Molecule Hunt: Archaeology and the Search for Ancient DNA*. (New York, NY: Arcade Publishing, 2002): 1-38; 234-240.

On Reserve

Lock, Gary and Kayt Brown. Eds. *On the Theory and Practice of Archaeological Computing*. Oxford, UK: Oxford Univ School of Archaeology, 2000.

On Reserve

- Gidlow, Jane. “Archaeological computing and disciplinary theory.”

## February 21: Reading Break



## February 28: Virtual Heritage and the Information Sciences

Addison, A.C. “Emerging trends in virtual heritage.” In *IEEE Multimedia*. 7(2): 22-25. April-June 2000.

Addison, A.C. and M. Gaiani. “Virtualized architectural heritage: new tools and techniques.” In *IEEE Multimedia*. 7(2): 26-31. April-June 2000.

Malpas, Jeff. “Cultural Heritage in the age of new media.” In *New Heritage: New Media and Cultural Heritage*. Eds. Yehuda E. Kalay, Thomas Kvan and Janice Affleck. (New York: Routledge, 2008): 13-26.

Roegiers, Sara and Frederik Truyen. “History is 3D: Presenting a framework for meaningful historical representations in digital media.” In *New Heritage: New Media and Cultural Heritage*. Eds. Yehuda E. Kalay, Thomas Kvan and Janice Affleck. (New York: Routledge, 2008): 67-78.

Donald H. Sanders. “Persuade or Perish: Moving Virtual Heritage beyond Pretty Pictures of the Past.” In *Proceedings of the Seventh International Conference on Virtual Systems and Multimedia (VSMM'01)*. Pp. 236-245.

## March 7: The Future of Digital History I

Berkowitz, Jacob. "The poop on ancient man." In *The Globe and Mail*. June 19, 2004.

Bonnett, John. "Charting a New Aesthetics for History: 3D, Scenarios, and the Future of the Historian's Craft." in *L'histoire sociale – Social History*. 40(79): 169-208. May 2007.

Bonnett, John. "Of Codices and Vocal History." [Paper to be distributed]

Dawkins, Richard. "Son of Moore's Law." In *The Next Fifty Years: Science in the First Half of the Twenty-First Century*. Ed. John Brockman. New York: Vintage Books, 2002. pp. 145-158

## March 14: The Future of Digital History II

Bonnett, John. "High-Performance Computing: An Agenda for the Social Sciences and the Humanities in Canada." in *Digital Studies*. 1(2). 2009.  
Available on-line at:

[http://www.digitalstudies.org/ojs/index.php/digital\\_studies/article/view/168/211](http://www.digitalstudies.org/ojs/index.php/digital_studies/article/view/168/211)

[May 12, 2010].

Feiner, Steven. "Augmented Reality: A New Way of Seeing." In *Scientific American*. April 2002.

Rejack, David. "Toward a Virtual Reenactment of History: Video Games and the Recreation of the Past." In *Rethinking History*. 11(3): 411-425. September 2007.

Turkel, William J. "Hacking History, from analogue to digital and back again." In *Rethinking History* 15(2): 287-296. June 2011.

## March 21: Student Seminars

## March 28: Student Seminars

## April 4: Student Seminars – Last Class – Paper Three Due

### Paper Topics:

The following topics may be used for your second paper:

1. **History and Computer Games** -- One important task for scholars and students devoted to history and computing is to track the writings of scholars in related disciplines regarding their use of computers to support research and education. Recently, researchers in education have been devoting increasing attention to the role that computer games can play to support education at all levels. Some of that discourse has been devoted to the field of history. Write an essay using 10 to 15 sources that discusses the role that computers can play to support education in general and historical instruction in particular. For this paper, you must use the two resources listed below. You will need to locate the remaining 8 to 13 sources yourself. If you choose this paper, *you must submit a bibliography of proposed sources to me before you begin reading and composing your paper*, to ensure that the materials come from reputable scholarly publications, such as education journals or *IEEE Multimedia*
  - Squire, Kurt. "Replaying History: Learning World History through playing Civilization III." Ph.D. Dissertation. Indiana University. 2004.

[http://website.education.wisc.edu/kdsquire/REPLAYING\\_HISTORY.doc](http://website.education.wisc.edu/kdsquire/REPLAYING_HISTORY.doc)

- Gee, James Paul. *What Video Games Have to Teach Us about Learning and Literacy*. New York: Palgrave-Macmillan, 2004.

Submit  
Proposed  
Bibliography  
before  
beginning  
paper

3. **Counterfactuals and History** – Counterfactuals are scenarios that are created by historians and other researchers concerned with the past. Their purpose is to explore the “what-ifs” of history, history as it might have plausibly occurred, but did not. For example, some scholars wonder how World War II might have ended if the U.S. had opted not to use the atomic bomb. Other scholars wonder if the British Empire might have survived if Britain had opted not to enter the First World War. As a general rule, historians have avoided counterfactuals. The general view has been that it is hard enough to reconstruct the past as it actually occurred without delving into history as it might have been. That attitude, however, has recently begun to change. A growing number of historians feel that exploring counterfactual histories can be a very useful exercise. They can assist historians in determining which of an array of potential causes was the most important in causing a historic event to occur. From the standpoint of this course, counterfactuals are of interest because agent-based simulations are likely to emerge as the instrument that historians use to construct counterfactuals. The purpose of this essay, therefore, is two-fold: to determine why some historians now believe counterfactuals can be useful instruments to interpret the past; and to determine why agent-based simulations will be useful instruments to support counterfactual analyses. Use the Hawthorn book listed below, five articles from the other two books listed below, and five articles devoted to agent-based simulations in history or a historical science to write your essay. You may use readings from this course in your articles related to agent-based simulations. You must obtain approval from me for the list of articles you compile prior to writing your essay.

- Hawthorn, Geoffrey. *Plausible Worlds: Possibility and understanding in history and the social sciences*. Cambridge, UK: Cambridge University Press, 1991.
- Tetlock, Philip and Aaron Belkin. *Counterfactual Thought Experiments in World Politics: Logical, Methodological and Psychological Perspectives*. (Princeton, NJ: Princeton

University Press, 1996.

- Tetlock, Philip, Richard Ned Lebow and Geoffrey Parker, Eds. *Unmaking the West: 'What-If?' Scenarios That Rewrite World History*. Ann Arbor: The University of Michigan Press, 2006.