Digital Humanities Curriculum Development: an iSchools Approach.





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Outline

- Background
 - DH Curriculum Committee
- Education Models
- Courses and Curricula
- Collaborative disciplines
- Careers
- iSchools and Digital Humanities
- Builds on:

Report from the iSchools Digital Humanities Curriculum Committee

Different focus here

iDHCC Members (2020 -)

- John A. Walsh, Co-Chair (Indiana University, USA)
- Marcia L. Zeng, Co-Chair (Kent State University, USA)
- Peter Cobb (University of Hong Kong, China)
- Wayne de Fremery (Sogang University, South Korea)
- Koraljka Golub (Linnaeus University, Sweden)
- Jeonghyun (Annie) Kim
 (University of North Texas, USA)

- Joseph Kiplangat (Moi University, Eldoret, Kenya)
- Ying-Hsang Liu (University of Southern Denmark, Denmark)
- Simon Mahony (Beijing Normal University at Zhuhai, China)
- Sam G. Oh, (Sungkyunkwan University, South Korea)
- Chris Alen Sula (Pratt Institute, USA)
- Ted Underwood (University of Illinois, USA)
- Xiaoguang Wang (Wuhan University, China)

Major Activities

- Preliminary fact-checking on the global DH education landscape
 - Data collected (from websites, across countries, disciplines, and educational programmes).
 - Reported findings at the 2021 iConference (Renmin)
- Survey of DH programmes in iSchools
- Prepared research paper based on work of iDHCC sub-committees on:
 - education models
 - courses and curricula
 - collaborative disciplines
 - careers
 - management and administrative issues
 - Now published see final slide.
- Prepared final report for iSchools community







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iSCHOOLS ORGANIZATION

The iSchools organization is a group of Information Schools dedicated to advancing the information field.

Read more



Statement on Violence in Ukraine

The iSchools condemn violent actions such as those currently taking place in Ukraine, and express their support of the principles and purposes of the United Nations Charter. We especially wish to support students in our field and allied fields who must break off their studies due to violence. In so far as possible, we will assist affected students to find ways to pursue their studies in safety.

The iSchools also support the statement of the International Federation



PHYSICALITY INCLUSIVITY

Virtual program: 13 - 17 March, 2023 Physical program: Barcelona, 27 - 29 March, 2023











ischools.org/iConference-2018-Summary

















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2018 Contents

Quick Links

By the Numbers

Supporting Materials

Organizers

<u>Awards</u>

Keynote Speakers

Sponsors

2018 Quick Links

Location: The University of Sheffield Campus

Date: March 25-28, 2018

Hosts: The Information School at the University of Sheffield and The iSchool at Northumbria University

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NEWS

iSchools Grants Support Member

6 Jul 2022 19:09 | iSchools News

Climate Change Information in the **iSchools**

29 Jun 2022 18:56 | iSchools News

Registration Opens for CLIR's 2022 Events, Keynotes Announced 29 Jun 2022 18:41 | iSchools News

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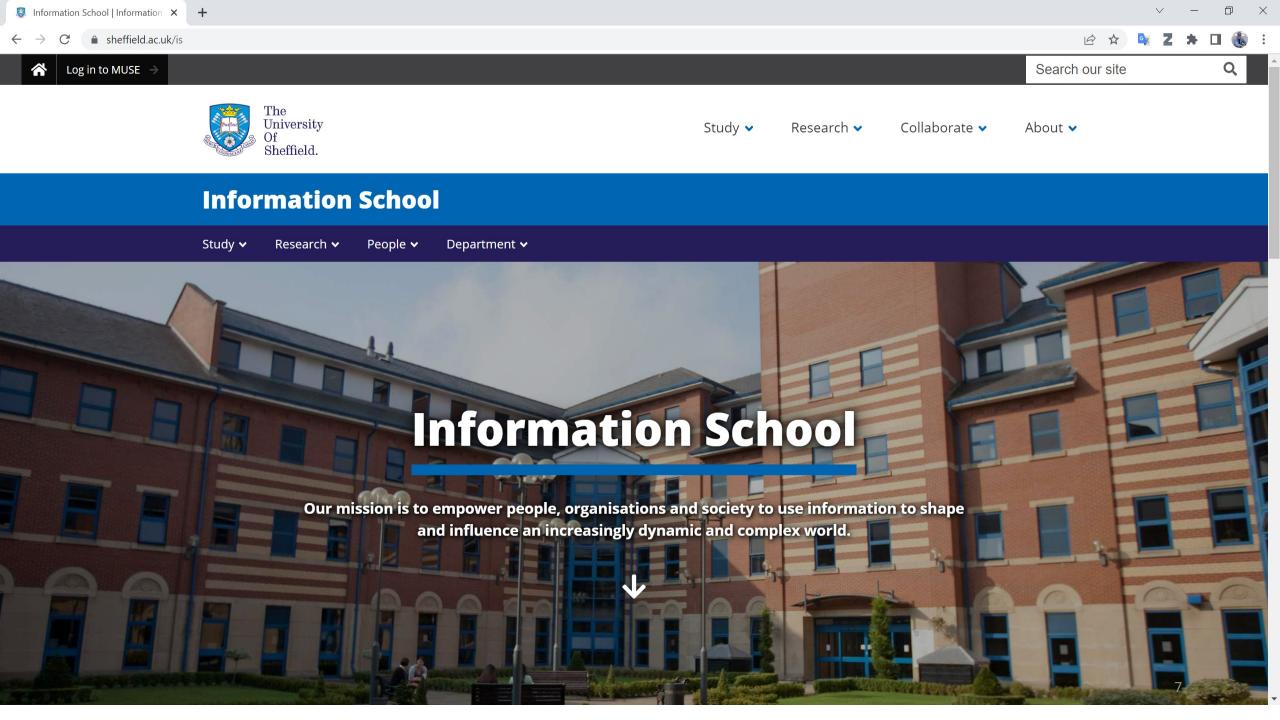








We currently support a number of special interest groups and hope to include iSchools scholars who would like to focus on climate





Digital Humanities Institute

Study with us v

Research v

About the DHI ➤

Home > Digital Humanities Institute > Study with us > Our MA courses

Our MA courses

At the Digital Humanities institute we offer two postgraduate masters programmes. MA Digital Culture and Communication and MA Cultural Data Management and Communication.



Introduction to our masters courses

Digital Humanities Institute projects and research

The DHI collaborates with a wide range of academic and cultural organisations on funded projects in the Arts and Humanities.

Find out more about current and past projects

Find a postgraduate course

A masters from Sheffield means indepth knowledge, advanced skills and the confidence to achieve your ambitions.





□ ucl.ac.uk/information-studies/

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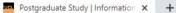
Department of Information Studies (Faculty of Arts & Humanities)

The UCL Department of Information Studies offers postgraduate qualifications and training for all the information professions.

The UCL Department of Information Studies is an international centre for knowledge creation and transfer in the fields of librarianship, archives and records management, publishing, information science and digital humanities. We are the only department in the UK which brings together in one place programmes in library and information studies, information science, archives and records management, publishing, and digital humanities. In 2019, we celebrated our Centenary with our Geographies of Information exhibition - you can find out more here.



















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Postgraduate Study

□ ucl.ac.uk/information-studies/study/postgraduate-study

MA in Library and Information Studies

MA in Archives and Records Management

MA in Digital Humanities

MSc in Digital Humanities

MRes in Information Studies

MSc in Knowledge, Information and Data Science

MA in Publishing

Postgraduate Study

We largely teach at the postgraduate level and offer probably the widest range of information disciplines in the country.

Covering the fields of Librarianship, Information Science, Archives, Records Management, Digital Humanities and Publishing, we not only offer a wide range of fields and provide wide professional choice but also, via options etc, the important context in which to study the individual information discipline of your choice.

Postgraduate teaching at DIS is delivered through a range of taught programmes. Please see the left hand menu for our full list, including fees, how to apply and more information.

Please note that we DO NOT accept applications from agencies on any of our programmes and we will not communicate with an agent regarding your application. We expect all applicants to complete their applications themselves.

Social media

- Staff blog
- Student blog
- Twitter

iSchools Community

- Connections
- Occupation and common interest
- Shared goals and values
- The relationship between information, people, and technology
- Very much a virtual community
- At a distance
- Also a global community

Regions

The iSchools Organization is a global consortium of information schools dedicated to advancing the information movement worldwide. While each individual iSchool has its own strengths and specializations, together they share a fundamental interest in the relationships between information, people, and technology.

In order to foster interschool collaboration, the iSchools are loosely organized into the three geographic regions: <u>Asia Pacific</u>, <u>Europe</u>, and <u>North America</u>. School leadership from each region meets regularly to discuss challenges and opportunities common to their area. Regional approaches to education, research and other matters are described in the regional subpages.

Asia Pacific

Asia/Pacific region is the most geographically broad of iSchools regions, spanning from China in the northern hemisphere to Australia in the southern hemisphere. <u>Visit regional subpages</u>.

Europe / Africa

The European region includes countries inside and outside the EU, and also extends into the Middle East and Africa. <u>Visit regional subpages</u>.

Americas

The American region includes Canada and the United States, to which the iSchools Organization and the iSchool movement trace their roots. The region also spans countries in Central and South America. <u>Visit regional subpages</u>.

Global iSchools commitment

Prof. Sam Oh

'I knew from the start that I wanted to do whatever I could to further promote and develop the iSchool movement on a global scale. It is my dearest wish that the iSchools will become truly international in every sense of the word' [1]

• Prof. Gobinda Chowdhury 'Inclusiveness and diversity are key attributes of the iSchools community' [2]

[1] ischools.org/resources/Documents/iconf%202020/iSchools-Outgoing-Chair-Farewell-Message.pdf [2] ischools.org/resources/Documents/iconf%202020/iSchools%20Chair%20message.pdf

DH curriculum in iSchools

- DH course registry
- Education models for DH
- DH courses and curricula

Education models: Data collection

- Manually reviewed university programme websites and collected data from the European-focused CLARIN-DARIAH <u>Digital Humanities Course Registry</u>
- Self-reported data from an online questionnaire, which focused exclusively on universities with iSchools http://skkudatalab.weebly.com/idhcc-2.html

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DIGITAL HUMANITIES COURSE REGISTRY



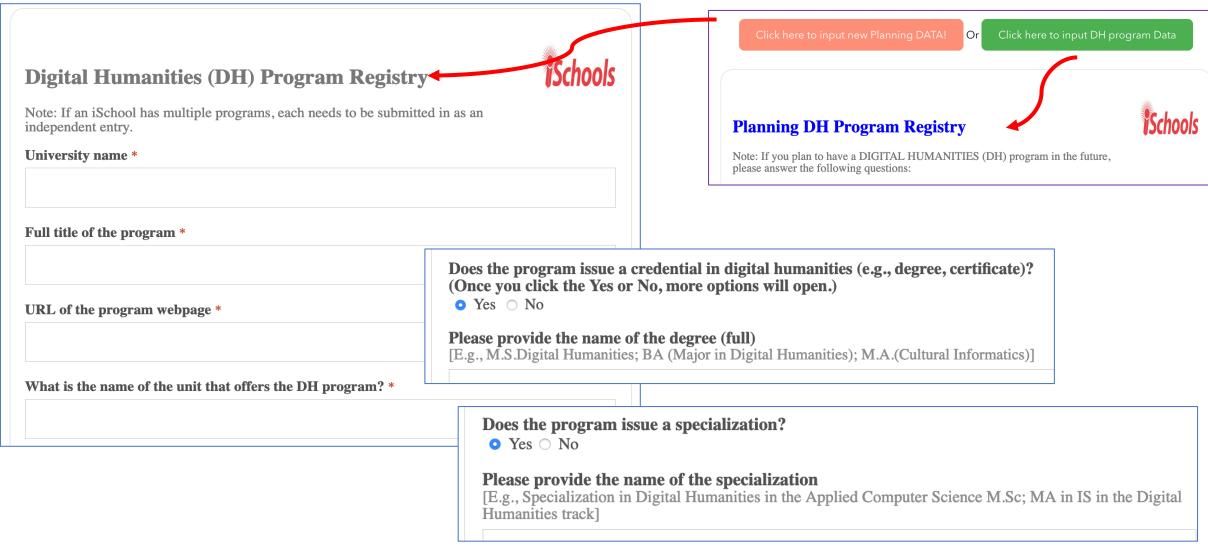


| NAME | UNIVERSITY | PLACE | DATE | ТҮРЕ |
|--|------------------------------------|-------------------------------|--------------------------|-----------------------|
| Skills in Transnational History MO5161 | University of St Andrews | St Andrews, United Kingdom | 10 Sept 🕏 1 semester | Module |
| MA in Digital Humanities | Lancaster University | Lancaster, United Kingdom | 4 Oct | Master Programme |
| MSc Digital Heritage | University of York | York, United Kingdom | 1 Oct ₡ 1 years | Master Programme |
| MSc Digital Archaeology | University of York | York, United Kingdom | 1 Oct ₡ 1 years | Master Programme |
| MA in Digital Humanities | King's College London | London, United Kingdom | 24 Sept | Master Programme |
| Introduction to Computational Linguistics (DHS) | University of Latvia | Riga, Latvia | 7 Feb 2023 1 semester | Course |
| Introduction to Computational Linguistics | University of Latvia | Riga, Latvia | 9 Feb | Master Programme |
| Media and Information | Universiteit van Amsterdam | Amsterdam, Netherlands | 1 Sept | Bachelor Programme |
| Laboratorio di Informatica per Umanisti (Computing for the | Unviersità degli Studi di Udine | Udine, Italy | 11 Feb & 10 weeks | Bachelor Programme |
| Digital Humanities Laboratory - Laboratorio di Informatica | University of Palermo | Palermo, Italy | 2 months | Course |
| PhD in Humanities and Technologies | University of Macerata | Macerata, Italy | 3 years | PhD Programme |
| Digital and Public Humanities | Università Ca' Foscari | Venice, Italy | 1 Sept Ø 2 years | Master Programme |
| First Level Master in Digital Humanities | Università Ca' Foscari | Venice, Italy | 1 years | Master Programme |
| Linguistic Computing | Università Cattolica del | Milan, | 1 Oct <i>₽</i> | Master |





iSchools DH Programme Registry



Data collection: CLARIN-DARIAH

- 426 DH course descriptions from the CLARIN-DARIAH <u>Digital Humanities</u> <u>Course Registry</u> as well as other DH programmes known to researchers.
- Together, these two datasets indicate the state of DH curriculum within our field, as well as relevant topics and methodologies which the iSchools might contribute to DH.
- Course descriptions were analyzed through the application of structural topic modeling.

Data Collection: iSchools Directory

- Course catalogues and programme websites of all schools (109) listed Identify courses with DH in the title or description.
- 34 courses identified in 26 institutions
- Syllabi for 24 courses obtained by web searches or direct requests to the named instructors.
- Course titles, descriptions, topics, learning outcomes, sources cited, assignments, and technologies were analyzed using frequency and text analysis.

Education models: Findings 1

- Globally
 - Master's programmes are the most common
 - Bachelor's degrees next
 - PhD programmes in DH are quite rare
 - Asia and Australia
 - 31 DH courses at 15 universities
 - 18 BAs, 11 at the Master's level, and 2 PhD programmes [new one at Renmin, Beijing]
 - North America
 - 44 DH courses at 39 universities
 - 15 BAs, 29 credentials at the Master's level, no PhD degree programmes
 - European
 - 45 DH degree programmes at 37 universities
 - 7 BA, 34 Master's level, 4 PhD degree programmes
 - Note: not all BA & Master's are full programmes and include certificates etc.

Education models: Findings 2

- Great diversity in the types of DH educational models:
 - PhD
 - MA & MSc
 - Graduate Certificate / short courses
 - Bachelor's major / minor / certificate
 - Specialisation / track / pathway / within Bachelor's major and minor
 - Asia and Australia, UG DH degrees dominate
 - North America and Europe graduate-level degrees are much more common
 - Full degree programmes are common in Europe whereas North American universities generally offer certificates

DH courses in iSchools

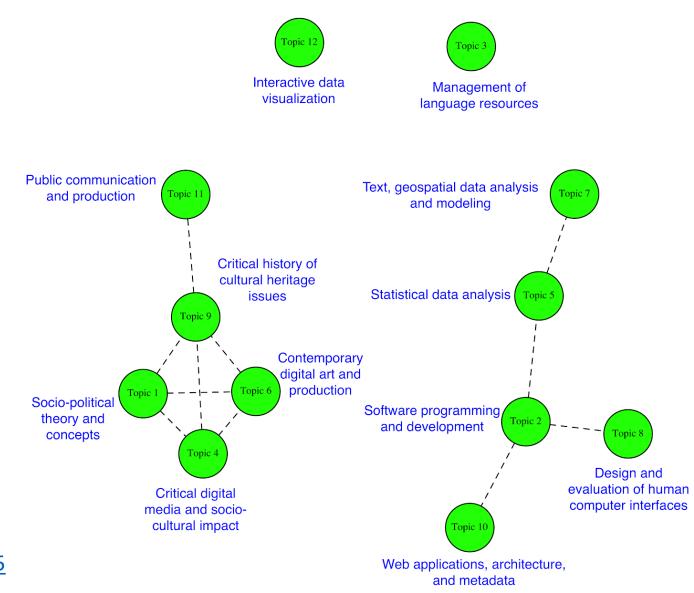
- 24% of iSchools offer courses explicitly about DH
 - usually a single course.
- Many iSchools offer courses in related areas:
 - Data science, research methods, libraries, and cultural heritage
- Similarities and differences DH teaching in iSchools and elsewhere
 - Common elements: critical evaluation, and reflection
 - In iSchools: Data science, research methods, libraries, and cultural heritage
 - Always with some exceptions

DH courses in iSchools

- Analysis of DH courses (426 in total) shows 12 key topics, 2 topic clusters, and 2 additional topics:
 - Cluster 1 includes:
 - Public communication and production,
 - Critical history of cultural heritage issues,
 - Socio-political theory and concepts,
 - Contemporary digital art and production
 - Critical digital media and socio-cultural impact.
 - Cluster 2 includes:
 - Text,
 - Geospatial data analysis and modeling,
 - Statistical data analysis,
 - Software programming and development,
 - Design and evaluation of human-computer interfaces,
 - Web applications and architecture
 - Metadata.
 - Additional topics include Interactive data visualization, and Management of language resources.

Force-directed layouts for visualizing topic models

Topic Model of DH course descriptions



Source: https://doi.org/10.1002/asi.24535

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Institutional engagement model

- Some iSchools have no DH programme
- Some have DH courses only offered to students in their iSchool
- iSchool engages informally with DH, and students both in and out of the iSchool can develop DH expertise by taking iSchool classes.
- The university may have a DH centre with formal DH programmes but with iSchool classes as components of those programmes.
- The university has or are planning to establish formal DH programmes and degrees within the iSchool that include a broad and organized collaboration with external departments.

Administrative Challenges

- Institutional issues
 - Cross-departmental programmes
 - Money follows the students
 - Ownership / responsibility for the programme
 - New programme or re-purpose existing modules
 - Full programme / major-minor / certificate / short courses
 - Compete with other programmes (take students away)
 - Financial, and staff resources
 - Physical space
 - Good fit with existing infrastructure
 - Accreditation
 - Link with job market and employment expectations

Synergy between DH & iSchool 1

- Both can be used to attract both UG and PG level students
- Link Information Science / Data Science etc. integral to humanistic and computational thinking in Liberal Arts
- Opportunity to integrate existing areas of expertise (e.g. LIS, HCI, IA) and emphasise creation, processing, analysis, and communication of data.

Synergy between DH & iSchool 2

- Complement each other and fill the gaps
- Expertise, disciplinary and intellectual diversity
 - Technologies
 - Research methods
 - Critical and theoretical frameworks
 - Book and media histories
 - Digital content
 - Data creation
 - Data management, description and analysis
 - Rich humanities content
 - Cultural heritage
- Interdisciplinary methods
- Collaboration across departments
- Deliver a rich student experience with mixed methods and approaches

Careers

- Analyzed 194 unique DH job advertisements announced in *Digital Humanities Now* between January 2010 and December 2019.
- Identified three broad categories of competencies:
 - Digital Stewardship (63%)
 - DH Research Methods/Tools
 - System Administration and Software Development competency

Source: https://doi.org/10.1002/asi.24535

| Category | Competency | No. (%) |
|-----------------------------|--|-----------|
| Digital | Digital content platform | 69 (35.6) |
| stewardship | Metadata | 57 (29.4) |
| | Copyright | 26 (13.4) |
| 1 | Digital collection/exhibit | 21 (10.8) |
| 1 | Digitization | 20 (10.3) |
| 1 | Digital media production | 19 (9.8) |
| 1 | Digital preservation practice | 18 (9.3) |
| 1 | Data management | 18 (9.3) |
| | Digital file formats | 6 (3.1) |
| DH research | Text analysis/mining | 63 (31.8) |
| | Data visualization | 62 (31.2) |
| tools | GIS/mapping | 49 (20.3) |
| | Text encoding | 28 (14.4) |
| | Network analysis | 23 (11.6) |
| 1 | Image analysis | 13 (6.6) |
| 1 | Data analysis (quantitative/ qualitative) | 12 (6.1) |
| | AR/VR/3D modeling | 12 (6.1) |
| , | Web scraping | 4 (2.0) |
| | Data cleaning/manipulation | 4 (2.0) |
| System | Scripting language | 64 (33.0) |
| administration | Website development | 59 (30.4) |
| and software development | Relational database | 45 (23.2) |
| • | XML and related standards | 20 (10.3) |
| , | Web application framework | 18 (9.3) |
| | Operating system (Unix, Linux, OS) | 17 (8.8) |
| , | Version control system | 16 (8.2) |
| 1 | Linked data and semantic web | 14 (7.2) |
| | Usability testing | 12 (6.2) |

Conclusions

- No one-size fits all
- Different models work in different institutions
 - Diversity and interdisciplinarity of DH
 - Not prescriptive about set courses
- Map and track the curriculum
 - Identify gaps in existing programmes
 Awareness of employment
 Market research?
- The expertise of both DH and iSchools compliment each other
 - Build on this experience and expertise
- Make iSchools a natural home for DH programmes
 - Technical, scientific, humanistic, critical, theoretical skill sets
- Enables cooperation and collaboration
 - DH helps ischools strengthen relationships with other departments and disciplines
- Good for both

Reference

Walsh, J. A., Cobb, P. J., de Fremery, W., Golub, K., Keah, H., Kim, J., Kiplang'at, J., Liu, Y.-H., Mahony, S., Oh, S. G., Sula, C. A., Underwood, T., & Wang, X. (2021). Digital humanities in the iSchool. *Journal of the Association for Information Science and Technology*, 1–16. (Open Access) https://doi.org/10.1002/asi.24535

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