History and School Information (1)

The Indiana University School of Informatics was the first school specifically focused on informatics in the United States. The School was directly funded by the Indiana General Assembly, signaling the state’s growing awareness of the need to develop its intellectual and academic infrastructures to address the professional, cultural and economic challenges of the 21st century—challenges which would almost invariably require some application of information technology. At the outset, the School established programs on the IU campuses in Bloomington, Indianapolis and South Bend.
The School of Informatics and Computing has three academic departments: BioHealth Informatics, Human-Centered Computing, and Library and Information Science. Each department offers unique and innovative programs taught by faculty who are committed to ongoing research in their areas of expertise and dedicated to preparing students for a successful future.

**BioHealth Informatics**

The BioHealth Informatics Department offers programs in Bioinformatics and Health Informatics as well as Health Information Management (HIM).

**Human-Centered Computing**

The Department of Human-Centered Computing includes Human-Computer Interaction (HCI), Media Arts and Science (MAS), and Informatics and data science.

**Library & Information Science**

Library and Information Science includes the universally respected, ALA accredited Master of Library and Information Science degree, and offers B.S. and Ph.D. programs in data science.

**Degree Programs (3)**

**Undergraduate**

- B.S. in Applied Data and Information Science
- B.S. in Biomedical Informatics
- B.S. in Health Information Management
- B.S. in Informatics
- B.S. in Media Arts & Science

- M.L.S. – Library & Information Science
- M.S. in Bioinformatics
- M.S. in Health Informatics

**Graduate**

- M.S. in Human-Computer Interaction
- M.S. in Media Arts and Science
- M.S. in Applied Data Science
- M.S. in Sports Analytics

**Doctorate**

- Ph.D. in Data Science
- Ph.D. in Informatics (Bioinformatics, Health Informatics or Human-Computer Interaction)
### Unduplicated Headcount by Career

<table>
<thead>
<tr>
<th>Academic Level</th>
<th>Fall 2015</th>
<th>Fall 2016</th>
<th>Fall 2017</th>
<th>Fall 2018</th>
<th>Fall 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Undergraduate</td>
<td>588</td>
<td>651</td>
<td>746</td>
<td>784</td>
<td>763</td>
</tr>
<tr>
<td>Graduate</td>
<td>420</td>
<td>471</td>
<td>486</td>
<td>517</td>
<td>573</td>
</tr>
<tr>
<td>Doctoral Research</td>
<td>51</td>
<td>46</td>
<td>53</td>
<td>51</td>
<td>47</td>
</tr>
<tr>
<td>Graduate Special</td>
<td>8</td>
<td>3</td>
<td>14</td>
<td>14</td>
<td>20</td>
</tr>
<tr>
<td>Undergrad Special</td>
<td>3</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>1,067</strong></td>
<td><strong>1,171</strong></td>
<td><strong>1,299</strong></td>
<td><strong>1,366</strong></td>
<td><strong>1,406</strong></td>
</tr>
</tbody>
</table>

Source: IRDS – Census Headcount Enrollment
Focused on the future…centered on inclusion. The School of Informatics and Computing at IUPUI believes that fostering an inclusive, tech-focused environment makes us stronger. We’re committed not only to welcoming, but actively recruiting and retaining people from all backgrounds and cultures to join the next generation of innovators.

At IUPUI, more than one in four newly-admitted students identify as coming from a diverse background. We want to broaden participation in computing to meet the technology demands of tomorrow. SOIC is dedicated to drawing on the strengths of a diverse community of students and faculty to achieve this goal.

### Enrollment by Gender

<table>
<thead>
<tr>
<th>Year</th>
<th>Female</th>
<th>Male</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fall 2015</td>
<td>544</td>
<td>523</td>
<td>1,067</td>
</tr>
<tr>
<td>Fall 2016</td>
<td>599</td>
<td>572</td>
<td>1,171</td>
</tr>
<tr>
<td>Fall 2017</td>
<td>652</td>
<td>647</td>
<td>1,299</td>
</tr>
<tr>
<td>Fall 2018</td>
<td>714</td>
<td>652</td>
<td>1,366</td>
</tr>
<tr>
<td>Fall 2019</td>
<td>748</td>
<td>658</td>
<td>1,406</td>
</tr>
</tbody>
</table>
Enrollment by Ethnicity

<table>
<thead>
<tr>
<th>Ethnicity</th>
<th>Fall 2015</th>
<th>Fall 2016</th>
<th>Fall 2017</th>
<th>Fall 2018</th>
<th>Fall 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>American Indian</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Asian</td>
<td>40</td>
<td>53</td>
<td>77</td>
<td>73</td>
<td>66</td>
</tr>
<tr>
<td>African American</td>
<td>94</td>
<td>91</td>
<td>95</td>
<td>105</td>
<td>112</td>
</tr>
<tr>
<td>Hispanic/Latino</td>
<td>43</td>
<td>51</td>
<td>59</td>
<td>92</td>
<td>85</td>
</tr>
<tr>
<td>Native Hawaiian/Pacific Island</td>
<td>2</td>
<td>1</td>
<td>0</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Two or More Races</td>
<td>34</td>
<td>39</td>
<td>48</td>
<td>50</td>
<td>52</td>
</tr>
<tr>
<td>White</td>
<td>709</td>
<td>777</td>
<td>830</td>
<td>859</td>
<td>861</td>
</tr>
<tr>
<td>International</td>
<td>138</td>
<td>156</td>
<td>187</td>
<td>185</td>
<td>219</td>
</tr>
<tr>
<td>Unknown</td>
<td>6</td>
<td>3</td>
<td>3</td>
<td>2</td>
<td>11</td>
</tr>
<tr>
<td>Grand Total</td>
<td>1,067</td>
<td>1,171</td>
<td>1,299</td>
<td>1,366</td>
<td>1,406</td>
</tr>
</tbody>
</table>
With retention and graduation, numbers for both have steadily increased in recent years. As shown in the provided table, our retention rates have drastically increased. This is a result of school-wide efforts and new proactive advising initiatives our academic advising team has introduced over the past four years. Some of these initiatives include hosting registration events, revamping the probation process, working with faculty on FLAGS, and working to create a collaborative environment within all of SoIC. Total graduates have increased from 256 to 423 over a five-year period, with steady growth among both bachelor and masters degrees conferred.
<table>
<thead>
<tr>
<th>Degrees conferred</th>
<th>FY 14-15</th>
<th>FY 15-16</th>
<th>FY 16-17</th>
<th>FY 17-18</th>
<th>FY 18-19</th>
</tr>
</thead>
<tbody>
<tr>
<td>Associate</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Bachelor</td>
<td>117</td>
<td>122</td>
<td>105</td>
<td>168</td>
<td>149</td>
</tr>
<tr>
<td>Masters</td>
<td>117</td>
<td>130</td>
<td>167</td>
<td>164</td>
<td>215</td>
</tr>
<tr>
<td>Doctoral</td>
<td>2</td>
<td>7</td>
<td>7</td>
<td>5</td>
<td>7</td>
</tr>
<tr>
<td>Grad Certificate</td>
<td>8</td>
<td>10</td>
<td>10</td>
<td>10</td>
<td>6</td>
</tr>
<tr>
<td>Undergrad Certificate &lt; 30 Hours</td>
<td>0</td>
<td>15</td>
<td>22</td>
<td>37</td>
<td>40</td>
</tr>
<tr>
<td>Undergrad Certificate/Diploma</td>
<td>12</td>
<td>0</td>
<td>0</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>Grand Total</td>
<td>256</td>
<td>284</td>
<td>311</td>
<td>385</td>
<td>423</td>
</tr>
</tbody>
</table>

Source: IUPUI Institutional Research and Decision Support, accessed online September 2019
Student Body Characteristics (5)

Source: IUPUI Institutional Research and Decision Support, Census Headcount Enrollment, SAT Range, Undergraduate, accessed online September 2019

<table>
<thead>
<tr>
<th>SAT Range</th>
<th>Fall 2015</th>
<th>Fall 2016</th>
<th>Fall 2017</th>
<th>Fall 2018</th>
<th>Fall 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>1000 - 1090</td>
<td>106</td>
<td>125</td>
<td>110</td>
<td>128</td>
<td>134</td>
</tr>
<tr>
<td>1100 - 1290</td>
<td>95</td>
<td>142</td>
<td>279</td>
<td>293</td>
<td>268</td>
</tr>
<tr>
<td>1300 and above</td>
<td>18</td>
<td>50</td>
<td>101</td>
<td>104</td>
<td>115</td>
</tr>
<tr>
<td>Less than 1000</td>
<td>177</td>
<td>203</td>
<td>122</td>
<td>116</td>
<td>93</td>
</tr>
<tr>
<td>Not indicated</td>
<td>192</td>
<td>131</td>
<td>134</td>
<td>143</td>
<td>153</td>
</tr>
<tr>
<td>Grand Total</td>
<td>588</td>
<td>651</td>
<td>746</td>
<td>764</td>
<td>763</td>
</tr>
</tbody>
</table>
Students with IU Awards/Chancellor’s Scholars/Honors:

<table>
<thead>
<tr>
<th>Year</th>
<th>Chancellor’s Scholars</th>
<th>Bepko Scholars and Fellows Program</th>
<th>Plater International Scholars Program</th>
<th>Adam W. Herbert Presidential Scholars Program</th>
<th>Honors Informatics and Computing</th>
</tr>
</thead>
<tbody>
<tr>
<td>2019</td>
<td>5</td>
<td>0</td>
<td>2</td>
<td>0</td>
<td>7</td>
</tr>
<tr>
<td>2018</td>
<td>8</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>6</td>
</tr>
<tr>
<td>2017</td>
<td>11</td>
<td>0</td>
<td>1</td>
<td>1</td>
<td>12</td>
</tr>
<tr>
<td>2016</td>
<td>7</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>5</td>
</tr>
<tr>
<td>2015</td>
<td>7</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

Source: IUPUI Institutional Research and Decision Support, Census Headcount Enrollment, HS GPA Range, Undergraduate, accessed online September 2019
Student Body Growth & Changes (6)

Over the last 5 years, the total student body for the School of Informatics and Computing on the IUPUI campus has grown from 1,023 to 1,406, adding nearly 400 students. Over the past three years the academic ability of incoming students has also increased, with more students SAT scores over 1,100.

Faculty (7)

Total annual number of faculty over the last 5 years, details of tenured faculty by rank, tenure-track, non-tenured, gender, minority, etc.

- From 2013 to 2018, the total number of full time faculty grew from 50 to 52 individuals. While tenure track positions have remained constant, there has been a slight increase in clinical/lecturer/visitor positions.
- The School of Informatics and Computing currently has 30 male faculty members in tenure track/clinical/lecturer/visitor positions. There are 17 female faculty members.
- Of the 52 tenure track/clinical/lecturer/visitor positions, 14 faculty members identify as non-white, and 7 identify as Asian.

Source: IUPUI Institutional Research and Decision Support, Faculty & Staff Dashboard, Employee Headcount Calculator, accessed online September 2019

Staff (8)

From 2013 to 2018, the school’s number of full-time staff remained constant, changing only slightly to 27 from the previous year (28 in 2017).

Source: IUPUI Institutional Research and Decision Support, Faculty & Staff Dashboard, Employee Headcount Calculator, accessed online September 2019
Budget (9)

IUPUI SOIC 5 Year Income/Expenses - General Fund

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Budget</td>
</tr>
<tr>
<td>STUDENT FEES</td>
<td>9,883,558</td>
<td>11,623,000</td>
<td>13,048,097</td>
<td>13,302,249</td>
<td>12,685,216</td>
</tr>
<tr>
<td>STATE APPROPRIATIONS</td>
<td>6,035,752</td>
<td>6,089,210</td>
<td>6,119,026</td>
<td>6,133,429</td>
<td>6,285,847</td>
</tr>
<tr>
<td>INDIRECT COST RECOVERY</td>
<td>211,705</td>
<td>234,864</td>
<td>377,527</td>
<td>515,769</td>
<td>649,500</td>
</tr>
<tr>
<td>OTHER REVENUE</td>
<td>12,716</td>
<td>89,004</td>
<td>4,227</td>
<td>1,895</td>
<td>550</td>
</tr>
<tr>
<td>ASSESSMENTS-REVENUE</td>
<td>-4,385,870</td>
<td>-4,651,568</td>
<td>-5,236,219</td>
<td>-5,738,433</td>
<td>-6,124,206</td>
</tr>
<tr>
<td>TRANSFER OF FUNDS</td>
<td>202,341</td>
<td>164,201</td>
<td>168,197</td>
<td>106,457</td>
<td>0</td>
</tr>
<tr>
<td>TOTAL INCOME</td>
<td>11,960,202</td>
<td>13,548,711</td>
<td>14,480,855</td>
<td>14,321,366</td>
<td>13,496,907</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Actual</td>
<td>Budget</td>
</tr>
<tr>
<td>COMPENSATION</td>
<td>7,902,542</td>
<td>9,269,988</td>
<td>10,386,854</td>
<td>9,608,105</td>
<td>10,191,210</td>
</tr>
<tr>
<td>FINANCIAL AID</td>
<td>1,438,406</td>
<td>2,245,593</td>
<td>1,875,529</td>
<td>2,534,088</td>
<td>1,712,330</td>
</tr>
<tr>
<td>GENERAL EXPENSE</td>
<td>704,541</td>
<td>815,148</td>
<td>809,126</td>
<td>775,602</td>
<td>876,321</td>
</tr>
<tr>
<td>TRAVEL</td>
<td>125,922</td>
<td>117,914</td>
<td>166,732</td>
<td>116,792</td>
<td>126,120</td>
</tr>
<tr>
<td>CAPITAL</td>
<td>27,788</td>
<td>33,363</td>
<td>11,517</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>TRANSFER OF FUNDS</td>
<td>809,967</td>
<td>1,760,385</td>
<td>200,984</td>
<td>364,929</td>
<td>123,033</td>
</tr>
<tr>
<td>TOTAL EXPENSES</td>
<td>11,009,166</td>
<td>14,242,393</td>
<td>13,450,742</td>
<td>13,399,516</td>
<td>13,029,014</td>
</tr>
</tbody>
</table>

| NET INCOME                   | 951,036  | -693,682 | 1,030,113| 921,850   | 467,893 |

Research & External Funding (10)

Annual Research/External Funding by Fiscal Year

<table>
<thead>
<tr>
<th></th>
<th>2015</th>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$1,229,960</td>
<td>$2,061,273</td>
<td>$4,956,628</td>
<td>$2,983,744</td>
<td>$1,801,395</td>
</tr>
</tbody>
</table>

Note: 2017 includes a large STEM NSF award that is not typical every year. The number of faculty securing external funding for research continues to grow in the school.

Development (11)

IN-SoIC’s original Bicentennial Campaign goal was $3.7M, which the school exceeded and received a raised, new goal of $6,000,000. As of June 30, 2019, the school had raised 94.8% of this increased goal, or a total of $5,687,407 with only $312,593 left to raise in the last year of the campaign.
The Health Information Management (HIM) Program celebrated 70 years of the program and accreditation by the Commission on Accreditation for Health Informatics and Information Management Education (CAHIIM) in 2019. The HIM Program conducts annual reviews and submits its Annual Program Assessment Report (APAR) details to CAHIIM as part of its accreditation standing. CAHIIM will be conducting a site visit in 2020 to update the program’s accreditation. The HIM Program is one of the longest-standing programs in the country, and one of the largest and most prestigious. A large number of the program’s very active alumni have gone on to serve as presidents and officers of the American Health Information Management Association as well as the Indiana Health Information Management Association; and have received lifetime achievement awards for their contributions to the profession.

The Health Informatics - Master’s program was granted initial accreditation at the Board Meeting on January 21, 2019 by the Commission on Accreditation for Health Informatics and Information Management Education (CAHIIM) and approved by the American Medical Informatics Association (AMIA). The Health Informatics program applied to CAHIIM for initial accreditation for the M.S. degree program in November 2016. The Review Panel has reviewed and accepted the self-assessment and standards and moved into Peer Review in spring 2018. A campus site visit was held in fall 2019 and the accreditation was granted in early spring 2020.

IN-SoIC’s Master of Library and Information Science, the entry degree for a professional librarian, is accredited by the American Library Association (ALA-MLS). Universally required for professionals in academic libraries, the MLIS is essential for leadership in public libraries and provides valuable management skills. Our graduates are honored as Movers and Shakers by the Library Journal, earn national awards for their work, and achieve positions of prominence. In academic year 2018-2019, the LIS program applied to have its accreditation reaffirmed. A self-study was submitted in October of 2018 and ALA’s Committee on Accreditation visited in February 2019. ALA accreditation was achieved in June 2019.

**Ranking Information (13)**

As mentioned in #22, this is an ongoing challenge for IN-SoIC: establishing a unique identity, separate from BL-SoIC, that will enable us to pursue ranking.
Awards (14)

Student Awards and Recognition 2019

Alex Douglass’s game “Lab Runner” received “Best in Show” at Vector Conference 2019 (includes $200 cash award)

Ben Nguyen’s game “Lumiette” was featured twice by the site Itch.io, a Prominent Independent Games Platform

HCI MS students won cash prizes at the state-wide AT&T FirstNet Hackathon held at the Indianapolis Motor Speedway. One team won $1000, another team took $2500 and a third team won $3500.

Carol Lewis, MPH, RHIA, IFHIMA-2019 received the IU HIM Program Philanthropy Award

Cindy Spann, MIS, RHIA, CHPS, CCS, CCS-P, FAHIMA-2019 received IU HIM Program Career Achievement Award

Allyson Marie Stichter, MHI, RHIA-2019 received IU HIM Program Rising Star Award

Rachel Palfi, RHIA-2019- IHIMA Scholarship

Rachel Palfi, RHIA- 2019 IUPUI Top 100 Outstanding Student Award

Erin Beal- 2019 Selected as an AHIMA Health Data and Information Conference volunteer

ISCBI Travel fellowship to Graduate PhD student Swapna Vidhur Daulatabad (with faculty Sarath Janga) to present work at the GLBio conference 2019.

ISCBI Travel fellowship to Graduate Masters student Sasank Vemuri (with faculty Sarath Janga) to present work at the GLBio conference 2019.
Faculty Awards and Recognition 2019

Josette Jones, IUPUI Outstanding Woman Faculty Leader Award

Danita Forgey, MIS, RHIA, CCS, CCS-P -2019 received the IU HIM Program Volunteer Service Award- Former Faculty/HIM Program Director

Alyson Young, Honorable Mention Paper Award, ACM Computer-Human Interaction (CHI) Conference

Albert William, IUPUI Trustees Teaching Award

Travis Faas, SoIC Excellence in Engagement and Service Award

Thomas Lewis, IUPUI Trustees Teaching Award

Albert William, SoIC Excellence in Scholarship of Teaching Award

Ayoung Yoon, Board of Trustees Teaching Award, Indiana University

Kyle Jones, Excellence in Teaching Award, School of Informatics and Computing

William Helling, Excellence in Teaching Award, School of Informatics and Computing

Lnn Dombrowski, Honorable Mention Paper Award, ACM Computer Support Cooperative Work Conference (CSCW)

Lou Lenzi, selected as IDEA juror. IDEA is one of the largest and most prestigious awards programs in the world, recognizing exceptional achievement as well as highlighting design strategy, branding, digital interaction and more.

William Helling, 2020 Fullbright-Haaga-Helia Scholar Award

Staff Awards and Recognition

Molly Morin, Ph.D., LiFT Scholars Program Manager: selected for the American Association for Hispanics in Higher Education (AAHHE) Graduate Student Fellows Program (GSFP), 2018

Molly Morin, Ph.D., LiFT Scholars Program Manager: recipient of the Hispanic Scholarship Fund Scholarship, 2018

Vicki Daugherty - Outstanding Woman Staff Leader, IUPUI, 2017

Vicki Daugherty - IUPUI Multicultural Impact Award, 2017

Departments and Programs Awards and Recognition

iDEW Program, Recipient-Tech Educator of the Year, TechPoint Mira Awards, 2018

iDEW Program, Recipient-Indiana Department of Education Award for Excellence in Career and Technical Education (as a partner with Arsenal Technical and Pike high schools), 2018

Department of Human-Computer Interaction became a member of the prestigious Human-Computer Interaction Consortium (HCIC), 2017

iDEW Program, Recipient-US2020 STEM Mentoring Award for Excellence in Public-Private Partnerships, 2017
New Faculty & Notable Recent Hires (15)

From 2013 to 2017, IN-SoIC focused on hiring junior tenure-track faculty and lecturers. For the tenure-track ranks, in 2013, 2 were hired; in 2015, 1 was hired; in 2016, 7 were hired and in 2017, an additional 7 were hired. Among these 2017 hires were our first African-American and our first LGBTQ tenure-track faculty members. In 2018, the SoIC hired 1 tenure-track faculty member. In 2019, 2 non-tenure-track and 1 tenure-track (our first Latina) faculty member were hired. For the coming 2019-20 academic year, the SoIC has added two tenure-track faculty members.

BioHealth Informatics

Cathy Fulton DNP, RN, ANP-BC, FNP-BC joined the department in the fall of 2018 as an assistant professor in Health Informatics. Dr. Fulton is an adult and family practitioner who has significant experience in primary care in rural health settings, providing care to indigent populations and most recently to college students.

Gary Schwebach, DBA, JD joined the department in 2018 as a professor of practice in Health Informatics. Professor Schwebach’s work helped form the BioHealth Informatics Research Center in Spring 2019, and he studies health informatics and underserved populations.

Human-Centered Computing

Lou Lenzi joined the department in 2017 has the first Professor of Practice in the School of Informatics and Computing. Lenzi was recognized in 2016 as one of the Top 50 Industrial Designers over the last 50 years by the Industrial Designers Society of America.

Library & Information Science

Soo Hyeon Kim, Ph.D., joined the department in the fall of 2019 as assistant professor and has a background in learning, design in technology.

Angela Murillo, Ph.D., joined the department in the fall of 2018 as assistant professor and serves as assistant professor and serves as program director for applied data and information science.

New Programs & Initiatives (16)

The LiFt Scholars program and iDEW (Informatics Diversity Enhanced Workforce) are special programs in the School of Informatics and Computing, engaging students at the high school level and in college. In its first four years, more than a thousand Indiana high school students have gone through the iDEW program. The Leading Informatics for Tomorrow (LiFt) Scholars Program is a multi-institutional program offered at the Indiana University School of Informatics and Computing at IUPUI and Ivy Tech Community College Central Indiana.

New Degrees and Graduate Certificates (last five years)

B.S. in Biomedical Informatics
B.S. in Applied Data and Information Science
Biomedical Data Analytics
Omics Technology and Precision Medicine
Thirteen Accelerated 5-year B.S./M.S. Programs
M.S. in Applied Data Science
M.S. in Sports Analytics
Ph.D. in Data Science
Space & Facilities (17)

The School of Informatics and Computing at IUPUI has offices in two locations: the IT building and Walker Plaza. The IT building has 27,300 sq. ft. allocated to faculty offices, staff offices, undergraduate and graduate study areas, research labs, and SOIC sponsored classrooms.

Four classrooms are outfitted with high-end Windows or Macintosh workstations to support industry standard applications. Two classrooms are laptop ready with power and network connections available. Three rooms in the IT building are dedicated study space to support undergraduate and graduate research. Two rooms in the IT building support Audio and Video production and post production. One room is dedicated to specific research projects. IT has a dedicated secure server room. SOIC maintains three racks of servers using that space.

Walker Plaza has 12,136 sq. ft. allocated to faculty offices, staff offices, graduate study areas, and research labs. Space at Walker Plaza is currently under a month-to-month lease. Five rooms are dedicated study space to support graduate students. Two suites are dedicated to specific research projects.

External Engagements (18)

Department of Human-Centered Computing

IoT Interface Design for Business Innovation that incorporates collaborative projects undertaken with industry and community partners. Past projects/partners have included:

- General Electric, Appliance Division. Project: the connected home and home health.
- Crown Equipment. Project: smart warehouse and material handling equipment telematics.
- IBM Research. Project: connected home and Eldercare/Aging-in-Place.
- Becks Hybrid Seeds. Project: Ground-based robotics and row-crop analytics.
- Rushville, IN. Project: “smart” public services for rural town-centers.
Each project sponsor participated in the department’s popular Industry Lecture Series with the exception of Rushville/Smart City. The “Smart City” lecture was presented by former mayor of Indianapolis and current Professor of Practice at Harvard’s Kennedy School of Government, Stephen Goldsmith. Mayor Goldsmith’s talk was follow by a panel discussion moderated by Professor Lenzi. Panelists were:

- Ken Clark, CIO City of Indianapolis
- Darshan Shah, Chief Data Officer, State of Indiana
- Hayleigh Columbo, Government beat reporter, Indianapolis Business Journal
- Stephen Goldsmith, Director of the Innovations in Government Program, Harvard University

Planned projects in Fall 2018 include:

- Shure Corporation (privately-held mfg. of microphones). Project: VUI-based IoT services.
- Allegion Security (Schlage branded security systems). Project: commercial building secure access.
- Delta Faucet, division of Masco Corporation. Project: IoT solutions for residential water fixtures, sold through retail channels.

Indiana IoT Lab: Professor Lenzi has led the department in establishing a presence in the Indiana IoT Lab in Fishers—providing a research and development space where students can collaborate with representatives from 10 technology companies in the design and construction of IoT products. Lenzi and students are launching an independent study project at the lab in summer 2018, focused on Home Health and IoT-based physical therapy.

Department of Human-Centered Computing Advisory Board: Members of the Advisory Board support the Department Chair and the Faculty in fulfilling the strategic objectives of the department by: (a) facilitating academia-industry partnerships, project collaborations and community engagement; (b) assisting in establishing career pipelines for our students; and (c) guiding the evolution of an industry-ready curriculum.

Capstone Courses: Degree requirements in the HCC Department include completion of a capstone course and project. These projects frequently entail collaboration with a wide array of community and industry partners, providing a platform for the student to demonstrate a body of knowledge while developing crucial client-provider skills and building relationships.

Client-driven Undergraduate Course Projects: To enhance project-based learning, in the course N420 Multimedia Project Management and N441 3D Productions, Media Arts and Science Program, instructor Zeb Wood has been engaging external stakeholders to offer to students the opportunity to practice the development of multimedia projects that meet real-world needs and problems that organizations face, as well as to learn how to communication and interact with external clients during the course of a project. Projects included Web and Mobile Applications, 3D Modelling, Virtual Reality and Augmented Reality Applications, and Digital Videos, engaging over 30 community partners.

**Department of Library & Information Science**

Rachel Applegate serves on the American Library Association’s Committee on Accreditation. Andrea Copeland (in collaboration with fellow faculty members, Ayoung Yoon, Zeb Wood and Albert William) has worked with the Bethel African Methodist Episcopal Church to digitally capture and reproduce the 180 year old church and its trove of archival documents and objects. This collaboration included assistance and input from the Indiana Historical Society and the Indiana State Museum. Kyle Jones was an invited presenter and participant at the Library Values and Privacy in Our National Digital Strategies Summit, NY (2018).
Department of BioHealth Informatics

BHI has developed several prominent local, national and international collaborations recently, including the below initiatives:

- International joint accelerated BS +MS program in health information management with Manipal University, India.
- Establishment of accelerated interdisciplinary BS+MS programs in biomedical sciences and bioinformatics with multiple minority serving institutions including Clark Atlanta University, Georgia and Delaware State University, Delaware.
- Establishment of the Biohealth Informatics Research Center (BHIRC) to develop solutions focused on partnerships with industry in Indiana and beyond, using data analytics applied to life science domain.
- Development of the annual BioHealth Informatics high school challenge to engage local high school students in life science informatics and to educate them about careers in biomedical informatics and biotechnological sciences.

Sarath Chandra Janga – Invited to organize special session on ‘RNA sequence to structure’ at the Great Lakes Bioinformatics (GLBio) conference 2019 and students from the Janga lab were invited to present two papers at the International Conference on Intelligent Biology and Medicine (ICIBM) 2019. Lab received recognition with a school level research award and received two new National Science Foundation (NSF) grants supporting their work over next three years, to develop for real time genomic and transcriptomic sequencing solutions using nanotechnology and deep learning methods. Resulting technologies will enable precision, personalized and home based clinical genomic solutions for numerous infectious and complex diseases to accelerate diagnostics.


Jay Patel (PhD Student) – Gave the following presentations:
- “Extraction and evaluation of medication data from Electronic Dental Records” presented at the Medical Informatics (MEDINFO) conference in 2018.
- “Identifying patients’ smoking status from electronic dental records data” presented at the Medical Informatics (MEDINFO) conference in 2018.
- “Qualitative Exploration of Factors Associated with Dental Provider Initiated Medical Consultations.” Presented at the IADR in 2018.
- “Utilizing Electronic Dental Record Data to Monitor Periodontal Disease Progression”- Mobilizing Computable Biomedical Knowledge (MCBK) in 2019.
International Collaborations (19)

Human-Centered Computing
Indian Institute of Technology, Delhi collaborates with faculty in the HCC Department in the exploration and development of designs and assistive technologies specifically targeting the blind and visually impaired. Additionally, the HCC Department maintains a summer study abroad program that has resulted in the development of a considerable connection with the city of Paros, Greece.

Library & Information Science
Andrea Copeland co-authored a book, Participatory Heritage, with a Danish collaborator from the Royal School of Library and Information Science at the University of Copenhagen.

Ayoung Yoon, in collaboration with Tomusange Isaac (Dean, Faculty of Science and Technology, Muteesa Royal University, Uganda) and Norman Mukasa (PhD, Senior Lecturer, Muteesa Royal University, Uganda), studies “Data Sharing and Reuse in Developing Countries,” to understand the current data practices in Uganda in order to promote open data culture and provide insights for developing data infrastructure for open data exchange.

Angela Murillo in engaged in research collaboration with Universidad Nacional Autónoma de México or in English National Autonomous Univ. of Mexico (UNAM) through the Instituto de Investigaciones Bibliotecologicas y de la Informacion (IIBI).

BioHealth Informatics
Huanmei Wu traveled to Newcastle University in England for an exploratory visit with international development funding form the IU Office of International Affairs. Additionally the BHI department was active in academic collaborations with universities in China, India and Europe.

Future Initiatives & Five Year Goals (20)

- Develop strong SoIC-industry linkages and establish an Informatics-Industry Innovation Hub.
- Establish an Institute for Diversity in Informatics to sustain and scale the highly successful iDEW and LiFT programs by raising $15M.
- Establish at least three successful centers in innovative solutions for Translational Biomedical Informatics, Data Lab, and Human-machine Symbiosis, respectively.
- Develop systematic plans for recruiting and retaining minority faculty in SoIC.
- Increase female student applications by 25% and diverse student applications by 35% in three years in the undergraduate degree programs.
- Expand collaborative activities in Thailand, China and India using IU Gateway offices.
- Establish at least one more study abroad programs.
- Establish an Informatics Future Faculty Fellows Program (IF3P): a targeted program to recruit and cultivate faculty members from diverse backgrounds.
- Establish SoIC Undergraduate Research Opportunities Program (SoIC UROP)
- Establish sustainable hackathon and challenge activities in biomedical sciences to high school and undergraduate students.
- Apply and establish an NSF REU site in biomedical informatics.
Bicentennial Strategic Plan Initiative (21)

Key Bicentennial Strategic Plan Initiatives being addressed & status:

**Priority One: A Commitment to Student Success**
- Support undergraduate students from diverse socioeconomic backgrounds through the LiFT and new Scholars programs
- Achieve 60% 4-year graduation rate through an innovation and proactive advising plan.
- Achieve and sustain 90% 1st retention rate and at least 85% 2nd year retention rate.
- Increase the number of courses and programs offered through online while balancing student engagement.
- Continue to develop the accelerated BS-MS programs in SoIC that will result in better and high paying job for graduates
- Promote SoIC Graduate Programs regionally and nationally to increase domestic graduate student enrollment.
- Explore and work with the iSchool International Consortium to attain iSchool ranking.
- Develop Off-Ramp programs in specialized areas in SoIC to serve undergraduate students seeking career readiness.

**Priority Three: Catalyzing Research**
- Identify unique research strengths in SoIC and develop collaborative teams within SoIC and across the campus to facilitate large external grant opportunities.
- Establish strong collaboration between SOIC researchers and industrial research and development, including local and national companies for translational research through the BioHealth research center.
- Develop and implement a SoIC Undergraduate Research Opportunities program to promote undergraduate research.

**Priority Five: A Global University**
- Establish two more study abroad programs in addition to the existing one.
- Effectively utilize the IU Gateway offices in Thailand, China and India to expand research and exchange programs with appropriate institutions at both countries.
- Continue to attract strong students from international universities.

**Priority Six: Health Sciences Research and Education to Improve the State and Nation's Health**
- Continue to support nation’s critical need in biomedical health workforce through SoICs well established biomedical informatics degree programs. Actively promote these programs in Indiana.
- Establish strong collaborations with 16th the Tech, IBRI, Regenstrief Institute, and precision medicine program at IUSOM
- Develop academic collaborations with international universities and establish articulation agreements.

**Priority Seven: Building a Prosperous and Innovative Indiana**
- Develop an informatics innovation hub in SoIC to bring industry-driven projects for students and faculty to work on in areas such as IoT, precision medicine, health informatics, Data analytics and visualization, and accessibility technologies.
- Promote entrepreneurial opportunities for SoIC faculty and students.
Future Challenges

Hiring a capable Associate Dean for Research and building a strong research program in SoIC.

Establishing viable industry and community relationships to develop research and entrepreneurial opportunities for faculty and students.

Establishing multidisciplinary research centers in Data Science and Accessibility Technologies.

Growing the school with a diverse and inclusive body of faculty.

Computer science at IUPUI not being part of SoIC and the impediments that causes for the school to reach its potential due to perceived conflict.

Establishing a distinct identity for IN-SoIC that can be leveraged for development, community engagement and recognition, organizational membership and ranking as well as for student and faculty recruitment.

 Recruiting and retaining students with the national decline of perspective student populations.