



# Staff Reactions to Life & Literature

---

## REPORT

Report Compiled By:

Michelle Abeln, Gilbert Borrego, Grace Costantino, Joe deVeer, J.J. Ford, Becky Morin,  
Matthew Person, Suzanne Pilsk, Trish Rose-Sandler, and Keri Thompson

# Table of Contents

---

|                          |         |
|--------------------------|---------|
| Executive Summary.....   | Page 1  |
| Background.....          | Page 3  |
| Survey.....              | Page 4  |
| Additional Comments..... | Page 6  |
| Conclusion.....          | Page 7  |
| Appendix.....            | Page 8  |
| Table A.....             | Page 8  |
| Image A.....             | Page 10 |
| Image B.....             | Page 11 |
| Image C.....             | Page 12 |
| Image D.....             | Page 13 |
| Image E.....             | Page 14 |

# Executive Summary

On 14-15 November, 2011, BHL hosted the first Life and Literature Conference at the Field Museum in Chicago, IL. As part of the conference, attendees were asked to suggest development priorities for future BHL project maintenance, expansion, innovation, and avoidance in the areas of “Technical Advancement,” “Content and Connections,” “New Collaborations,” and “Educational Outreach.”

The BHL Executive Committee asked Staff to produce a report prioritizing Life and Literature conference attendee suggestions and providing any additional staff thoughts related to the conference.

To create this report, a Staff Reactions to Life and Literature Committee was formed. Committee members include: Michelle Abeln, Gilbert Borrego, Grace Costantino, Joe deVeer, J.J. Ford, Becky Morin, Matthew Person, Suzanne Pilsk, Trish Rose-Sandler, and Keri Thompson.

Using a survey created via the web application [www.qualtrics.com](http://www.qualtrics.com), BHL staff ranked attendee suggestions, combined with any additional staff suggestions, for future BHL development. Results from the survey outline the following top priorities for each of the four indicated categories:

| <b>Technical Advancement</b> | <b>Content and Connections</b> | <b>New Collaborations</b>   | <b>Educational Outreach</b>     |
|------------------------------|--------------------------------|---|---------------------------------|
| Improve General Search       | Allow article-level access     | Collaborate with partners that already have existing digitized literature that we can ingest into BHL | Harmonize BHL family of portals |

Following is a summary graph presenting staff prioritization of BHL future development in the areas of “Technical Advancement,” “Content and Connections,” “New Collaborations,” and “Educational Outreach.”



# Background

---

On 14-15 November, 2011, BHL hosted the first Life and Literature Conference at the Field Museum in Chicago, IL. The express purpose of the conference was to generate conversations about the priorities for biodiversity literature digitization, particularly as it pertains to BHL, for the next 4-5 years.

The conference included four panel sessions (“Research, Informatics, and the Published Record;” “Publishers, Aggregators, and Authors - New Models and Access;” “Learning and Education;” and “Building Collaborative Networks for Science and the Humanities through Scientific Literature”) followed by breakout sessions that allowed attendees to delve deeply into the themes discussed during the panels. Breakout Sessions were organized according to four categories: “Technical Advancement,” “Content and Connections,” “New Collaborations,” and “Educational Outreach.”

As part of the breakout sessions, attendees were asked to suggest development priorities for future BHL project maintenance, expansion, innovation, and avoidance. See “Appendix, Image A, page 10” for a summary of the suggestions provided by attendees in each category.

To help BHL executive staff appropriately integrate attendee ideas into strategic planning for BHL’s future, the BHL Executive Committee asked Staff to prioritize breakout session suggestions, as well as provide any additional staff thoughts related to the conference, and present this information in the form of a Staff Reactions to Life and Literature Report.

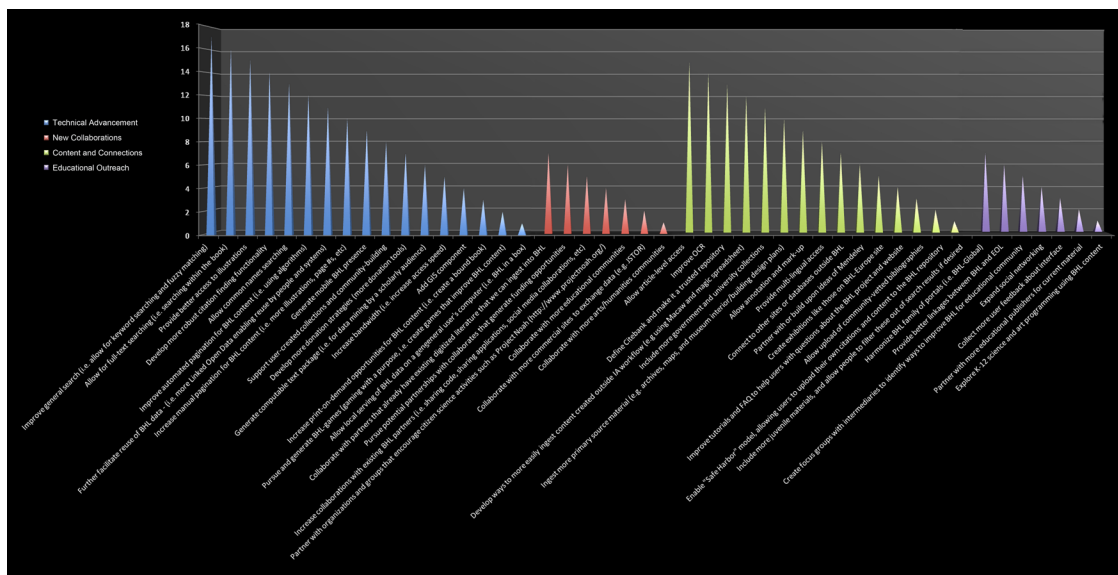
To create this report, a Staff Reactions to Life and Literature Committee was formed. Committee members include: Michelle Abeln, Gilbert Borrego, Grace Costantino, Joe deVeer, J.J. Ford, Becky Morin, Matthew Person, Suzanne Pilsk, Trish Rose-Sandler, and Keri Thompson.

# Survey

The Staff Reactions to Life and Literature Committee created a survey to allow BHL staff to prioritize the suggestions provided by conference attendees for BHL Maintenance, Expansion and Innovation in the categories of “Technical Advancement,” “Content and Connections,” “New Collaborations,” and “Educational Outreach.” The Committee also solicited further ideas from Staff via email and the BHL Staff Meeting (16 November, 2011). Attendee and staff suggestions were then combined to create a single list of priorities for BHL Staff to rank. See “Appendix, Table A, page 8” for final list.

The survey, created using the web application [www.qualtrics.com](http://www.qualtrics.com), presented the categories and items on the list indicated above. A link to the survey was sent out to BHL staff, who were asked to rank the suggestions in each category according to their most to least important priority. A total of 24 responses were collected.

Below is a summary graph presenting staff priorities for BHL. See “Appendix, Images B-E, pages 11-14” for detailed survey results for each of the four categories investigated.



**Staff Prioritization: BHL Future Development**

## Technical Development Discussion

“Improve General Search” and “Allow for Full-Text Searching” were the top two contenders. Neither were ranked lowest by any respondents and more than half ranked these two items as either the first or second highest priority. At 2.25, “Improve General Search” has the lowest standard deviation, and at 2.79, “Allow for Full-Text Searching” has the fourth-lowest standard deviation.

“Pursue and Generate BHL Games” and “Allow Local Serving of BHL Data” were the second-lowest and lowest-ranked priorities, respectively, by BHL staff. No respondents ranked “BHL Games” higher than 8 and 20% ranked it the lowest priority. No respondents ranked “Local Serving” higher than 7 and nearly half ranked it the 15th (out of 17) lowest priority.

## New Collaborations Discussion

“Collaborate with Partners that have Existing Digitized Literature” and “Pursue Partnerships with Collaborators that Generate Funding Opportunities” were the top two contenders. Neither were ranked lowest by any respondents. 60% of respondents ranked “Existing Digitized Literature” as the first or second highest priority and 70% ranked “Funding Opportunities” as the first, second, or third highest priority. “Existing Digitized Literature” has the lowest standard deviation (1.07) of all options, while “Funding Opportunities” has the fourth-lowest (1.46).

“Collaborate with Commercial Sites” and “Collaborate with Arts/Humanities Communities” had the second-lowest and lowest scores, respectively. 40% of respondents respectively ranked “Commercial Sites” and “Arts/Humanities” the least-important priorities. This result is interesting, considering that many staff members voiced improving collaborations with the arts and humanities communities as a priority at the Staff Meeting, 16, Nov., 2011.

## Content and Connections Discussion

“Allow Article-Level Access” and “Improve OCR” were the top two rated options. Neither were ranked as the lowest priority by any respondent. 70% of respondents ranked “Article-Level Access” as the first-third highest priority, while 60% ranked “Improve OCR” as the first-third highest priority. “Article-Level Access” has the lowest standard deviation (1.91), while “Improve OCR” has the second-lowest (2.39).

“Include More Juvenile Materials” was the lowest-rated option, with nearly 50% of respondents ranking it the lowest priority. It had the fifth-lowest standard deviation at 2.86.

## Educational Outreach Discussion

“Harmonize the BHL Family of Portals” and “Provide Better Linkages between BHL and EOL” were the top two rated options. 60% of respondents ranked “Harmonize Portals” as the highest priority, while 60% ranked “Better Linkages” as the first-third highest priority. “Harmonize Portals” has the second-lowest standard deviation, at 1.50.

“Partner with Educational Publishers for Current Material” and “Explore K-12 Science and Art Programming using BHL Content” were the second-lowest and lowest-ranked priorities, respectively. 33% of respondents ranked “Educational Publishers” as the lowest priority, while 30% ranked “K-12 Science and Art” as the lowest priority.



# Additional Comments

---

At the BHL Staff Meeting, 16 November, 2011, staff had the opportunity to voice any additional thoughts about or reactions to the Life and Literature conference. These comments are listed below:

- ~ Conference attendees seemed most excited about visionary ideas presented at the conference for exploiting the art in BHL and reaching out to the art and humanities community. The Humanities panel was one of the most popular of the four, and the idea of increasing the uses of BHL images and incorporating art more firmly into the project came up in each of the break-out sessions.
- ~ When expanding the BHL mission to the realm of education, we should view our goal as educating “citizens,” encompassing everyone with a desire to learn. We should not limit our perspective to just children.
- ~ We should target collaborations with entities that provide funding opportunities.
- ~ An important question to ask: “How do we avoid alienating our core group of users while expanding to new user bases?”
- ~ BHL should expand the scope of the project to reach new audiences but should also find ways to market existing content to new audiences.
- ~ BHL should develop new tools for accessing BHL content, providing new ways for users to use existing content.
- ~ BHL should explore the question: “What is our future relationship with EOL?”
- ~ BHL should incorporate keyword searching and partial title searching.



# Conclusion

The BHL Executive Committee asked Staff to produce a report prioritizing Life and Literature conference attendee ideas for future BHL development and providing any additional staff thoughts related to the conference. Suggestions for BHL future development were organized according to four themes: “Technical Advancement,” “Content and Connections,” “New Collaborations,” and “Educational Outreach.”

To create the report, a Staff Reactions to Life and Literature Committee was formed. Committee members include: Michelle Abeln, Gilbert Borrego, Grace Costantino, Joe deVeer, J.J. Ford, Becky Morin, Matthew Person, Suzanne Pilsk, Trish Rose-Sandler, and Keri Thompson.

Using a survey created via the web application [www.qualtrics.com](http://www.qualtrics.com), BHL staff ranked attendee suggestions, combined with any additional staff suggestions, for future BHL development. Results from the survey outline the following top priorities for each of the four indicated categories:

| <b>Technical Advancement</b> | <b>Content and Connections</b> | <b>New Collaborations</b>   | <b>Educational Outreach</b>     |
|------------------------------|--------------------------------|---|---------------------------------|
| Improve General Search       | Allow article-level access     | Collaborate with partners that already have existing digitized literature that we can ingest into BHL | Harmonize BHL family of portals |

General comments from staff also indicated a desire to investigate opportunities to collaborate with the arts and humanities community; pursue partnerships with a broad range of content providers, particularly those that might generate funding opportunities; develop strategies for reaching new audiences; and improve the user experience.

# Appendix

## Table A: Final List of Options (Ranked)

### Technical Advancement

- 1) Improve general search (i.e. allow for keyword searching and “fuzzy matching”)
- 2) Allow for full-text searching (i.e. searching within the book)
- 3) Provide better access to illustrations
- 4) Develop more robust citation finding functionality
- 5) Allow common names searching
- 6) Improve automated pagination for BHL content (i.e. using algorithms)
- 7) Further facilitate reuse of BHL data - (i.e. more Linked Open Data enabling reuse by people and systems)
- 8) Increase manual pagination for BHL content (i.e. more illustrations, page #s, etc)
- 9) Generate mobile BHL presence
- 10) Support user-created collections and community-building
- 11) Develop more donation strategies (more donation tools)
- 12) Generate computable text package (i.e. for data mining by a scholarly audience)
- 13) Increase bandwidth (i.e. increase access speed)
- 14) Add GIS component
- 15) Increase print-on-demand opportunities for BHL content (i.e. create a bound book)
- 16) Pursue and generate BHL-games (gaming with a purpose, i.e. create games that improve BHL content)
- 17) Allow local serving of BHL data on a general user’s computer (i.e. BHL in a box)

*Continued Next Page*

*Table A Continued***New Collaborations**

- 1) Collaborate with partners that already have existing digitized literature that we can ingest into BHL
- 2) Pursue potential partnerships with collaborators that generate funding opportunities
- 3) Increase collaborations with existing BHL partners (i.e. sharing code, sharing applications, social media collaborations, etc)
- 4) Partner with organizations and groups that encourage citizen science activities such as Project Noah (<http://www.projectnoah.org/>)
- 5) Collaborate with more educational communities
- 6) Collaborate with more commercial sites to exchange data (e.g. JSTOR)
- 7) Collaborate with more arts/humanities communities

**Content and Connections**

- 1) Allow article-level access
- 2) Improve OCR
- 3) Define Citebank and make it a trusted repository
- 4) Develop ways to more easily ingest content created outside IA workflow (e.g using Macaw and magic spreadsheet)
- 5) Include more government and university collections
- 6) Ingest more primary source materials (e.g. archives, maps, and museum interior/building design plans)
- 7) Allow annotation and mark-up
- 8) Provide multi-lingual access
- 9) Connect to other sites or databases outside BHL
- 10) Partner with or build upon ideas of Mendeley
- 11) Create exhibitions like those on BHL-Europe site
- 12) Improve tutorials and FAQ to help users with questions about the BHL project and website
- 13) Allow upload of community-vetted bibliographies
- 14) Enable “Safe Harbor” model, allowing users to upload their own citations and content to the BHL repository
- 15) Include more juvenile materials, and allow people to filter these out of search results if desired

**Educational Outreach**

- 1) Harmonize BHL family of portals (i.e. BHL-Global)
- 2) Provide better linkages between BHL and EOL
- 3) Create focus groups with intermediaries to identify ways to improve BHL for educational community
- 4) Expand social networking
- 5) Collect more user feedback about interface
- 6) Partner with more educational publishers for current material
- 7) Explore K-12 science and art programming using BHL content

# Image A

## Conference Attendees: Summary Breakout Sessions

|  |  |  |   |   |  |   |   |   |   |
|--|--|--|---|---|--|---|---|---|---|
| <p><b>Breakout Session: <i>Content &amp; Connections</i></b></p> <table border="1"> <tbody> <tr> <td data-bbox="110 611 435 831"> <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Content based on communities (Scratchpads)</li> <li>• Accept other scanned content</li> <li>• Define CiteBank &amp; make it a trusted repository</li> <li>• Article level access</li> </ul> </td> <td data-bbox="440 611 792 831"> <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Allow annotation &amp; mark-up connect to outside sources</li> <li>• OCR corrections</li> <li>• Click &amp; go</li> <li>• Multi-lingual access</li> <li>• Connecting to other databases</li> </ul> </td> </tr> <tr> <td data-bbox="110 837 435 953"> <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Scanning more stuff!</li> <li>• CiteBank</li> <li>• Feedback</li> </ul> </td> <td data-bbox="440 837 792 953"> <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Charging</li> <li>• Closed access</li> <li>• Imposing layers of interpretation</li> </ul> </td> </tr> </tbody> </table>  | <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Content based on communities (Scratchpads)</li> <li>• Accept other scanned content</li> <li>• Define CiteBank &amp; make it a trusted repository</li> <li>• Article level access</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Allow annotation &amp; mark-up connect to outside sources</li> <li>• OCR corrections</li> <li>• Click &amp; go</li> <li>• Multi-lingual access</li> <li>• Connecting to other databases</li> </ul>   | <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Scanning more stuff!</li> <li>• CiteBank</li> <li>• Feedback</li> </ul>             | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Charging</li> <li>• Closed access</li> <li>• Imposing layers of interpretation</li> </ul>  | <p><b>Breakout Session: <i>New Collaborations</i></b></p> <table border="1"> <tbody> <tr> <td data-bbox="841 611 1166 831"> <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Art and pattern recognition               <ul style="list-style-type: none"> <li>• Interface of art &amp; science</li> </ul> </li> <li>• Expanding into commercial sites</li> </ul> </td> <td data-bbox="1170 611 1520 831"> <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Archives, hidden collections, oral histories</li> <li>• Maps, posters, framed works</li> <li>• Recording designs of spaces in museums, aquaria, zoos</li> </ul> </td> </tr> <tr> <td data-bbox="841 837 1166 953"> <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Include more government &amp; university collections</li> </ul> </td> <td data-bbox="1170 837 1520 953"> <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Expanding into commercial sites</li> </ul> </td> </tr> </tbody> </table>   | <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Art and pattern recognition               <ul style="list-style-type: none"> <li>• Interface of art &amp; science</li> </ul> </li> <li>• Expanding into commercial sites</li> </ul> | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Archives, hidden collections, oral histories</li> <li>• Maps, posters, framed works</li> <li>• Recording designs of spaces in museums, aquaria, zoos</li> </ul>   | <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Include more government &amp; university collections</li> </ul>   | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Expanding into commercial sites</li> </ul>   |
| <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Content based on communities (Scratchpads)</li> <li>• Accept other scanned content</li> <li>• Define CiteBank &amp; make it a trusted repository</li> <li>• Article level access</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Allow annotation &amp; mark-up connect to outside sources</li> <li>• OCR corrections</li> <li>• Click &amp; go</li> <li>• Multi-lingual access</li> <li>• Connecting to other databases</li> </ul>   |  |   |   |  |   |   |   |   |
| <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Scanning more stuff!</li> <li>• CiteBank</li> <li>• Feedback</li> </ul>  | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Charging</li> <li>• Closed access</li> <li>• Imposing layers of interpretation</li> </ul>   |  |   |   |  |   |   |   |   |
| <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Art and pattern recognition               <ul style="list-style-type: none"> <li>• Interface of art &amp; science</li> </ul> </li> <li>• Expanding into commercial sites</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Archives, hidden collections, oral histories</li> <li>• Maps, posters, framed works</li> <li>• Recording designs of spaces in museums, aquaria, zoos</li> </ul>  |  |   |   |  |   |   |   |   |
| <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Include more government &amp; university collections</li> </ul>  | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Expanding into commercial sites</li> </ul>  |  |   |   |  |   |   |   |   |
| <p><b>Breakout Session: <i>Tech Advancements</i></b></p> <table border="1"> <tbody> <tr> <td data-bbox="110 1163 435 1383"> <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Bandwidth / Access</li> <li>• Common Names</li> <li>• Better metadata / granularity</li> <li>• Local serving</li> <li>• User-created collections &amp; community-building</li> <li>• Access to illustrations</li> </ul> </td> <td data-bbox="440 1163 792 1383"> <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Mobile               <ul style="list-style-type: none"> <li>• Different resolutions</li> </ul> </li> <li>• Gaming with a purpose               <ul style="list-style-type: none"> <li>• Citizen science</li> </ul> </li> <li>• "BHL in a Box"               <ul style="list-style-type: none"> <li>• Computable text package</li> </ul> </li> <li>• Non-crowd sourcing               <ul style="list-style-type: none"> <li>• Algorithms at scale</li> </ul> </li> </ul> </td> </tr> <tr> <td data-bbox="110 1390 435 1505"> <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• More of the same but better &amp; more</li> <li>• Expose all BHL content</li> </ul> </td> <td data-bbox="440 1390 792 1505"> <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Older technologies               <ul style="list-style-type: none"> <li>• What was cool won't be</li> </ul> </li> <li>• Solutions in search of a problem</li> <li>• Not going mobile</li> <li>• Limiting Access</li> </ul> </td> </tr> </tbody> </table> | <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Bandwidth / Access</li> <li>• Common Names</li> <li>• Better metadata / granularity</li> <li>• Local serving</li> <li>• User-created collections &amp; community-building</li> <li>• Access to illustrations</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Mobile               <ul style="list-style-type: none"> <li>• Different resolutions</li> </ul> </li> <li>• Gaming with a purpose               <ul style="list-style-type: none"> <li>• Citizen science</li> </ul> </li> <li>• "BHL in a Box"               <ul style="list-style-type: none"> <li>• Computable text package</li> </ul> </li> <li>• Non-crowd sourcing               <ul style="list-style-type: none"> <li>• Algorithms at scale</li> </ul> </li> </ul> | <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• More of the same but better &amp; more</li> <li>• Expose all BHL content</li> </ul> | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Older technologies               <ul style="list-style-type: none"> <li>• What was cool won't be</li> </ul> </li> <li>• Solutions in search of a problem</li> <li>• Not going mobile</li> <li>• Limiting Access</li> </ul> | <p><b>Breakout Session: <i>Educational Outreach</i></b></p> <table border="1"> <tbody> <tr> <td data-bbox="841 1163 1166 1383"> <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Focus groups with intermediaries</li> <li>• Expand BLE tool</li> <li>• Social networking</li> <li>• Explore science &amp; art linkages</li> </ul> </td> <td data-bbox="1170 1163 1520 1383"> <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Add GIS component</li> <li>• Tools / API development               <ul style="list-style-type: none"> <li>• Access to game designers</li> </ul> </li> <li>• Computable data</li> <li>• Partnerships with publishers for current material</li> </ul> </td> </tr> <tr> <td data-bbox="841 1390 1166 1505"> <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Biodiversity Library Exhibitions Tool</li> <li>• Harmonize BHL family of portals</li> <li>• User feedback about interface</li> <li>• Better linkages between BHL &amp; EOL</li> </ul> </td> <td data-bbox="1170 1390 1520 1505"> <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Pay attention to brand</li> <li>• Too big, too fast</li> <li>• Bad metadata</li> <li>• Don't be valueless</li> </ul> </td> </tr> </tbody> </table> | <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Focus groups with intermediaries</li> <li>• Expand BLE tool</li> <li>• Social networking</li> <li>• Explore science &amp; art linkages</li> </ul>                                   | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Add GIS component</li> <li>• Tools / API development               <ul style="list-style-type: none"> <li>• Access to game designers</li> </ul> </li> <li>• Computable data</li> <li>• Partnerships with publishers for current material</li> </ul> | <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Biodiversity Library Exhibitions Tool</li> <li>• Harmonize BHL family of portals</li> <li>• User feedback about interface</li> <li>• Better linkages between BHL &amp; EOL</li> </ul> | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Pay attention to brand</li> <li>• Too big, too fast</li> <li>• Bad metadata</li> <li>• Don't be valueless</li> </ul> |
| <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Bandwidth / Access</li> <li>• Common Names</li> <li>• Better metadata / granularity</li> <li>• Local serving</li> <li>• User-created collections &amp; community-building</li> <li>• Access to illustrations</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Mobile               <ul style="list-style-type: none"> <li>• Different resolutions</li> </ul> </li> <li>• Gaming with a purpose               <ul style="list-style-type: none"> <li>• Citizen science</li> </ul> </li> <li>• "BHL in a Box"               <ul style="list-style-type: none"> <li>• Computable text package</li> </ul> </li> <li>• Non-crowd sourcing               <ul style="list-style-type: none"> <li>• Algorithms at scale</li> </ul> </li> </ul> |  |   |   |  |   |   |   |   |
| <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• More of the same but better &amp; more</li> <li>• Expose all BHL content</li> </ul>  | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Older technologies               <ul style="list-style-type: none"> <li>• What was cool won't be</li> </ul> </li> <li>• Solutions in search of a problem</li> <li>• Not going mobile</li> <li>• Limiting Access</li> </ul>  |  |   |   |  |   |   |   |   |
| <p><b>Expand</b></p> <ul style="list-style-type: none"> <li>• Focus groups with intermediaries</li> <li>• Expand BLE tool</li> <li>• Social networking</li> <li>• Explore science &amp; art linkages</li> </ul>  | <p><b>Innovate</b></p> <ul style="list-style-type: none"> <li>• Add GIS component</li> <li>• Tools / API development               <ul style="list-style-type: none"> <li>• Access to game designers</li> </ul> </li> <li>• Computable data</li> <li>• Partnerships with publishers for current material</li> </ul>  |  |   |   |  |   |   |   |   |
| <p><b>Maintain</b></p> <ul style="list-style-type: none"> <li>• Biodiversity Library Exhibitions Tool</li> <li>• Harmonize BHL family of portals</li> <li>• User feedback about interface</li> <li>• Better linkages between BHL &amp; EOL</li> </ul>  | <p><b>Avoid</b></p> <ul style="list-style-type: none"> <li>• Pay attention to brand</li> <li>• Too big, too fast</li> <li>• Bad metadata</li> <li>• Don't be valueless</li> </ul>  |  |   |   |  |   |   |   |   |

# Image B

## Technical Advancements: Detailed Survey Results

| #  | Answer   | 1  | 2  | 3  | 4  | 5  | 6  | 7  | 8  | 9  | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | Responses |
|----|--|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|-----------|
| 7  | Improve general search (i.e. allow for keyword searching and "fuzzy matching")                           | 10 | 5  | 2  | 4  | 1  | 0  | 0  | 0  | 0  | 0  | 1  | 0  | 0  | 0  | 0  | 0  | 0  | 23        |
| 8  | Allow for full-text searching (i.e. searching within the book)   | 5  | 10 | 3  | 0  | 2  | 0  | 0  | 0  | 1  | 2  | 0  | 0  | 0  | 0  | 0  | 0  | 0  | 23        |
| 5  | Develop more robust citation finding functionality   | 2  | 0  | 1  | 5  | 2  | 3  | 1  | 3  | 5  | 0  | 0  | 1  | 0  | 0  | 0  | 0  | 0  | 23        |
| 10 | Provide better access to illustrations   | 1  | 2  | 7  | 1  | 2  | 1  | 3  | 0  | 2  | 1  | 1  | 1  | 0  | 1  | 0  | 0  | 0  | 23        |
| 15 | Increase manual pagination for BHL content (i.e. more illustrations, page #s, etc)                       | 1  | 1  | 1  | 2  | 2  | 3  | 4  | 1  | 0  | 1  | 0  | 0  | 1  | 1  | 1  | 3  | 1  | 23        |
| 16 | Allow common names searching   | 1  | 1  | 3  | 2  | 3  | 4  | 1  | 1  | 3  | 1  | 1  | 1  | 0  | 0  | 0  | 0  | 1  | 23        |
| 6  | Develop more donation strategies (more donation tools)   | 1  | 0  | 0  | 0  | 1  | 2  | 1  | 2  | 1  | 2  | 0  | 4  | 2  | 4  | 0  | 2  | 1  | 23        |
| 2  | Increase print-on-demand opportunities for BHL content (i.e. create a bound book)                        | 1  | 0  | 0  | 0  | 0  | 1  | 1  | 0  | 0  | 1  | 1  | 2  | 1  | 3  | 3  | 5  | 4  | 23        |
| 17 | Increase bandwidth (i.e. increase access speed)  | 1  | 0  | 0  | 0  | 1  | 2  | 2  | 1  | 1  | 2  | 2  | 1  | 1  | 0  | 1  | 6  | 1  | 23        |
| 14 | Improve automated pagination for BHL content (i.e. using algorithms)                                     | 0  | 3  | 3  | 3  | 1  | 2  | 1  | 2  | 2  | 1  | 1  | 1  | 0  | 0  | 2  | 1  | 0  | 23        |
| 4  | Generate mobile BHL presence   | 0  | 1  | 2  | 0  | 2  | 1  | 3  | 1  | 4  | 2  | 2  | 0  | 2  | 1  | 1  | 1  | 0  | 23        |
| 13 | Allow local serving of BHL data on a general user's computer (i.e. BHL in a box)                         | 0  | 0  | 0  | 0  | 0  | 0  | 1  | 1  | 0  | 0  | 0  | 2  | 3  | 2  | 9  | 4  | 1  | 23        |
| 9  | Further facilitate reuse of BHL data - (i.e. more Linked Open Data enabling reuse by people and systems) | 0  | 0  | 1  | 2  | 4  | 1  | 3  | 5  | 0  | 1  | 3  | 0  | 2  | 1  | 0  | 0  | 0  | 23        |
| 3  | Pursue and generate BHL-games (gaming with a purpose, i.e. create games that improve BHL content)        | 0  | 0  | 0  | 0  | 0  | 0  | 0  | 1  | 0  | 4  | 1  | 2  | 4  | 4  | 0  | 2  | 5  | 23        |
| 1  | Add GIS component  | 0  | 0  | 0  | 2  | 0  | 0  | 1  | 1  | 1  | 2  | 2  | 3  | 4  | 1  | 0  | 2  | 4  | 23        |
| 11 | Support user-created collections and community-building  | 0  | 0  | 0  | 0  | 2  | 0  | 1  | 3  | 1  | 3  | 4  | 1  | 3  | 3  | 1  | 1  | 0  | 23        |
| 12 | Generate computable text package (i.e. for data mining by a scholarly audience)                          | 0  | 0  | 0  | 2  | 0  | 3  | 0  | 0  | 2  | 1  | 4  | 3  | 0  | 1  | 6  | 1  | 0  | 23        |
|    | Total  | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | -         |

| Statistic          | Add GIS component | Increase print-on-demand opportunities for BHL content (i.e. create a bound book) | Pursue and generate BHL-games (gaming with a purpose, i.e. create games that improve BHL content) | Generate mobile BHL presence | Develop more robust citation finding functionality | Develop more donation strategies (more donation tools) | Improve general search (i.e. allow for keyword searching and "fuzzy matching") | Allow for full-text searching (i.e. searching within the book) | Further facilitate reuse of BHL data - (i.e. more Linked Open Data enabling reuse by people and systems) | Provide better access to illustrations | Support user-created collections and community-building | Generate computable text package (i.e. for data mining by a scholarly audience) | Allow local serving of BHL data on a general user's computer (i.e. BHL in a box) | Improve automated pagination for BHL content (i.e. using algorithms) | Increase manual pagination for BHL content (i.e. more illustrations, page #s, etc) | Allow common names searching | Increase bandwidth (i.e. increase access speed) |
|--------------------|-------------------|---|---|------------------------------|--|--|--|--|--|--|---|---|--|--|--|------------------------------|---|
| Min Value          | 4                 | 1   | 8   | 2                            | 1  | 1  | 1  | 1  | 3  | 1                                      | 5   | 4   | 7  | 2  | 1  | 1                            | 1   |
| Max Value          | 17                | 17  | 17  | 16                           | 12   | 17   | 11   | 10   | 14   | 14                                     | 16  | 16  | 17   | 16   | 17   | 17                           | 17  |
| Mean               | 12.00             | 13.35   | 13.39   | 8.78                         | 6.13   | 10.83  | 2.52   | 3.17   | 7.87   | 5.74                                   | 10.78   | 11.04   | 14.00  | 7.13   | 8.48   | 6.57                         | 11.22   |
| Variance           | 14.91             | 16.60   | 7.52  | 14.81                        | 7.94   | 16.33  | 5.08   | 7.79   | 9.85   | 13.02                                  | 9.18  | 14.32   | 5.91   | 19.30  | 25.35  | 13.71                        | 22.54   |
| Standard Deviation | 3.86              | 4.07  | 2.74  | 3.85                         | 2.82   | 4.04   | 2.25   | 2.79   | 3.14   | 3.61                                   | 3.03  | 3.78  | 2.43   | 4.39   | 5.04   | 3.70                         | 4.75  |
| Total Responses    | 23                | 23  | 23  | 23                           | 23   | 23   | 23   | 23   | 23   | 23                                     | 23  | 23  | 23   | 23   | 23   | 23                           | 23  |

\* Improve General Searching: Ranked top priority by 10 people; second top priority by 5 people; lowest priority by 0 people  
 \* Allow Full-Text Searching: Ranked top priority by 5 people; second top priority by 10 people; lowest priority by 0 people  
 \* More Robust Citation Finding: Ranked top priority by 2 people; second top priority by 0 people; lowest priority by 0 people  
 \* Access to Illustrations: Ranked top priority by 1 person; second top priority by 2 people; lowest priority by 0 people  
 \* Increase Manual Pagination: Ranked top priority by 1 person; second top priority by 1 person; lowest priority by 1 person  
 \* Common Names Searching: Ranked top priority by 1 person; ranked second top priority by 1 person; lowest priority by 1 person  
 \* Donation Strategies: Ranked top priority by 1 person; second top priority by 0 people; lowest priority by 1 person  
 \* Print-on-Demand: Ranked top priority by 1 person; second top priority by 0 people; lowest priority by 4 people  
 \* Increase Bandwidth: Ranked top priority by 1 person; second top priority by 0 people; lowest priority by 6 people

\* Improve Automated Pagination: Ranked top priority by 0 people; second top priority by 3 people; lowest priority by 0 people  
 \* Mobile BHL Presence: Ranked top priority by 0 people; second top priority by 1 person; lowest priority by 0 people  
 \* Local Serving of BHL Data: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 1 person  
 \* Facilitate Reuse of BHL Data: Ranked top priority by 0 people; ranked second top priority by 0 people; lowest priority by 0 people  
 \* BHL-Games: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 5 people  
 \* GIS Component: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 4 people  
 \* User-Created Collections & Community Building: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 0 people  
 \* Computable Text Package: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 0 people



# Image C

## New Collaborations: Detailed Survey Results

| # | Answer   | 1  | 2  | 3  | 4  | 5  | 6  | 7  | Responses |
|---|--|----|----|----|----|----|----|----|-----------|
| 1 | Partner with organizations and groups that encourage citizen science activities such as Project Noah ( <a href="http://www.projectnoah.org/">http://www.projectnoah.org/</a> ) | 7  | 1  | 3  | 2  | 4  | 4  | 2  | 23        |
| 2 | Pursue potential partnerships with collaborates that generate funding opportunities  | 5  | 7  | 5  | 4  | 0  | 2  | 0  | 23        |
| 3 | Collaborate with more educational communities  | 0  | 0  | 6  | 5  | 6  | 4  | 2  | 23        |
| 4 | Increase collaborations with existing BHL partners (i.e. sharing code, sharing applications, social media collaborations, etc)   | 4  | 3  | 4  | 4  | 6  | 1  | 1  | 23        |
| 5 | Collaborate with more commercial sites to exchange data (e.g. JSTOR)   | 0  | 3  | 1  | 1  | 4  | 5  | 9  | 23        |
| 6 | Collaborate with more arts/humanities communities  | 0  | 0  | 1  | 3  | 3  | 7  | 9  | 23        |
| 7 | Collaborate with partners that already have existing digitized literature that we can ingest into BHL  | 7  | 9  | 3  | 4  | 0  | 0  | 0  | 23        |
|   | Total  | 23 | 23 | 23 | 23 | 23 | 23 | 23 | -         |

| Statistic          | Partner with organizations and groups that encourage citizen science activities such as Project Noah ( <a href="http://www.projectnoah.org/">http://www.projectnoah.org/</a> ) | Pursue potential partnerships with collaborates that generate funding opportunities | Collaborate with more educational communities | Increase collaborations with existing BHL partners (i.e. sharing code, sharing applications, social media collaborations, etc) | Collaborate with more commercial sites to exchange data (e.g. JSTOR) | Collaborate with more arts/humanities communities | Collaborate with partners that already have existing digitized literature that we can ingest into BHL |
|--------------------|--|---|---|--|--|---|---|
| Min Value          | 1  | 1   | 3   | 1  | 2  | 3   | 1   |
| Max Value          | 7  | 6   | 7   | 7  | 7  | 7   | 4   |
| Mean               | 3.65   | 2.70  | 4.61  | 3.52   | 5.48   | 5.87  | 2.17  |
| Variance           | 4.78   | 2.13  | 1.70  | 2.99   | 3.08   | 1.48  | 1.15  |
| Standard Deviation | 2.19   | 1.46  | 1.31  | 1.73   | 1.75   | 1.22  | 1.07  |
| Total Responses    | 23   | 23  | 23  | 23   | 23   | 23  | 23  |

\* Partner with Groups that Encourage Citizen Science Activities: Ranked top priority by 7 people; ranked second top priority by 1 person; ranked lowest priority by 2 people

\* Collaborators with Funding Opportunities: Ranked top priority by 5 people; second top priority by 7 people; lowest priority by 0 people

\* Collaborate with Educational Communities: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 2 people

\* Increase Collaborations with BHL Partners: Ranked top priority by 4 people; ranked second top priority by 3 people; lowest priority by 1 person

\* Collaborate with Commercial Sites: Ranked top priority by 0 people; second top priority by 3 people; lowest priority by 9 people

\* Collaborate with Arts/Humanities Communities: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 9 people

\* Collaborate with Partners with Existing Digitized Literature: Ranked top priority by 7 people; second top priority by 9 people; lowest priority by 0 people

# Image D

## Content and Connections: Detailed Survey Results

| #  | Answer   | 1  | 2  | 3  | 4  | 5  | 6  | 7  | 8  | 9  | 10 | 11 | 12 | 13 | 14 | 15 | Responses |
|----|--|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|-----------|
| 1  | Define Citebank and make it a trusted repository   | 4  | 3  | 3  | 1  | 3  | 1  | 2  | 1  | 2  | 0  | 1  | 0  | 0  | 1  | 1  | 23        |
| 2  | Include more government and university collections   | 0  | 2  | 3  | 1  | 1  | 5  | 5  | 1  | 2  | 1  | 1  | 1  | 0  | 0  | 0  | 23        |
| 3  | Ingest more primary source material (e.g. archives, maps, and museum interior/building design plans)           | 1  | 1  | 2  | 3  | 1  | 3  | 1  | 5  | 1  | 2  | 1  | 0  | 1  | 0  | 1  | 23        |
| 4  | Allow article-level access   | 5  | 9  | 3  | 1  | 2  | 2  | 0  | 1  | 0  | 0  | 0  | 0  | 0  | 0  | 0  | 23        |
| 5  | Allow annotation and mark-up   | 1  | 1  | 3  | 0  | 2  | 3  | 2  | 2  | 5  | 1  | 1  | 1  | 0  | 1  | 0  | 23        |
| 6  | Improve OCR  | 7  | 3  | 4  | 3  | 2  | 1  | 1  | 1  | 1  | 0  | 0  | 0  | 0  | 0  | 0  | 23        |
| 7  | Include more juvenile materials, and allow people to filter these out of search results if desired             | 0  | 0  | 0  | 1  | 0  | 0  | 0  | 0  | 1  | 3  | 2  | 3  | 0  | 2  | 11 | 23        |
| 8  | Provide multi-lingual access   | 1  | 0  | 0  | 3  | 2  | 3  | 3  | 0  | 0  | 2  | 5  | 0  | 1  | 2  | 1  | 23        |
| 9  | Connect to other sites or databases outside BHL  | 0  | 0  | 0  | 1  | 3  | 1  | 1  | 2  | 3  | 3  | 5  | 3  | 0  | 1  | 0  | 23        |
| 10 | Partner with or build upon ideas of Mendeley   | 0  | 0  | 0  | 2  | 0  | 3  | 2  | 2  | 2  | 4  | 3  | 2  | 2  | 0  | 1  | 23        |
| 11 | Create exhibitions like those on BHL-Europe site   | 0  | 0  | 1  | 2  | 0  | 0  | 3  | 4  | 2  | 2  | 2  | 4  | 1  | 1  | 1  | 23        |
| 12 | Allow upload of community-vetted bibliographies  | 0  | 0  | 0  | 2  | 1  | 0  | 0  | 2  | 1  | 0  | 0  | 7  | 7  | 3  | 0  | 23        |
| 13 | Enable "Safe Harbor" model, allowing users to upload their own citations and content to the BHL repository     | 0  | 0  | 0  | 1  | 1  | 1  | 1  | 0  | 1  | 2  | 1  | 1  | 8  | 6  | 0  | 23        |
| 14 | Develop ways to more easily ingest content created outside IA workflow (e.g using Macaw and magic spreadsheet) | 4  | 4  | 3  | 1  | 4  | 0  | 0  | 0  | 1  | 1  | 0  | 0  | 2  | 1  | 2  | 23        |
| 15 | Improve tutorials and FAQ to help users with questions about the BHL project and website                       | 0  | 0  | 1  | 1  | 1  | 0  | 2  | 2  | 1  | 2  | 1  | 1  | 1  | 5  | 5  | 23        |
|    | Total  | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | 23 | -         |

| Statistic          | Define Citebank and make it a trusted repository | Include more government and university collections | Ingest more primary source material (e.g. archives, maps, and museum interior/building design plans) | Allow article-level access | Allow annotation and mark-up | Improve OCR | Include more juvenile materials, and allow people to filter these out of search results if desired | Provide multi-lingual access | Connect to other sites or databases outside BHL | Partner with or build upon ideas of Mendeley | Create exhibitions like those on BHL-Europe site | Allow upload of community-vetted bibliographies | Enable "Safe Harbor" model, allowing users to upload their own citations and content to the BHL repository | Develop ways to more easily ingest content created outside IA workflow (e.g using Macaw and magic spreadsheet) | Improve tutorials and FAQ to help users with questions about the BHL project and website |
|--------------------|--|--|--|----------------------------|------------------------------|-------------|--|------------------------------|---|--|--|---|--|--|--|
| Min Value          | 1  | 2  | 1  | 1                          | 1                            | 1           | 4  | 1                            | 4   | 4  | 3  | 4   | 4  | 1  | 3  |
| Max Value          | 15   | 12   | 15   | 8                          | 14                           | 9           | 15   | 15                           | 14  | 15   | 15   | 14  | 14   | 15   | 15   |
| Mean               | 5.39   | 6.35   | 6.91   | 2.87                       | 7.04                         | 3.35        | 12.78  | 8.39                         | 9.13  | 9.22   | 9.30   | 11.09   | 11.39  | 5.83   | 10.96  |
| Variance           | 16.70  | 7.51   | 12.26  | 3.66                       | 10.95                        | 5.69        | 8.18   | 14.79                        | 7.39  | 8.54   | 10.13  | 9.90  | 9.79   | 24.88  | 15.23  |
| Standard Deviation | 4.09   | 2.74   | 3.50   | 1.91                       | 3.31                         | 2.39        | 2.86   | 3.85                         | 2.72  | 2.92   | 3.18   | 3.15  | 3.13   | 4.99   | 3.90   |
| Total Responses    | 23   | 23   | 23   | 23                         | 23                           | 23          | 23   | 23                           | 23  | 23   | 23   | 23  | 23   | 23   | 23   |

\* Define Citebank: Ranked top priority by 4 people; second top priority by 3 people; lowest priority by 1 person

\* Government & University Publications: Ranked top priority by 0 people; second top priority by 2 people; lowest priority by 0 people

\* Primary Source Material: Ranked top priority by 1 person; second top priority by 1 person; lowest priority by 1 person

\* Article-Level Access: Ranked top priority by 5 people; second top priority by 9 people; lowest priority by 0 people

\* Annotation & Mark-Up: Ranked top priority by 1 person; second top priority by 1 person; lowest priority by 0 people

\* Improve OCR: Ranked top priority by 7 people; second top priority by 3 people; lowest priority by 0 people

\* Juvenile Materials: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 11 people

\* Multi-Lingual Access: Ranked top priority by 1 person; second top priority by 0 people; lowest priority by 1 person

\* Connect to Sites Outside BHL: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 0 people

\* Partner with Mendeley: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 1 person

\* Create Exhibitions: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 1 person

\* Allow Upload of Bibliographies: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 0 people

\* Enable "Safe Harbor" Model: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 0 people

\* Ingest Content Outside IA Workflow: Ranked top priority by 4 people; second top priority by 4 people; lowest priority by 2 people

\* Improve Tutorials & FAQ: Ranked top priority by 0 people; second top priority by 0 people; lowest priority by 5 people



# Image E

## Educational Outreach: Detailed Survey Results

| # | Answer  | 1  | 2  | 3  | 4  | 5  | 6  | 7  | Responses |
|---|---|----|----|----|----|----|----|----|-----------|
| 4 | Harmonize BHL family of portals (i.e. BHL-Global)   | 7  | 9  | 1  | 3  | 2  | 1  | 0  | 23        |
| 2 | Provide better linkages between BHL and EOL   | 6  | 4  | 5  | 2  | 2  | 3  | 1  | 23        |
| 7 | Partner with more educational publishers for current material                                     | 1  | 4  | 0  | 3  | 4  | 3  | 8  | 23        |
| 6 | Explore K-12 science and art programming using BHL content  | 1  | 2  | 1  | 1  | 4  | 7  | 7  | 23        |
| 5 | Expand social networking  | 1  | 2  | 7  | 4  | 3  | 5  | 1  | 23        |
| 3 | Collect more user feedback about interface  | 0  | 2  | 5  | 5  | 7  | 2  | 2  | 23        |
| 1 | Create focus groups with intermediaries to identify ways to improve BHL for educational community | 7  | 0  | 4  | 5  | 1  | 2  | 4  | 23        |
|   | Total   | 23 | 23 | 23 | 23 | 23 | 23 | 23 | -         |

| Statistic          | Create focus groups with intermediaries to identify ways to improve BHL for educational community | Provide better linkages between BHL and EOL | Collect more user feedback about interface | Harmonize BHL family of portals (i.e. BHL-Global) | Expand social networking | Explore K-12 science and art programming using BHL content | Partner with more educational publishers for current material |
|--------------------|---|---|--|---|--------------------------|--|---|
| Min Value          | 1   | 1   | 2  | 1   | 1                        | 1  | 1   |
| Max Value          | 7   | 7   | 7  | 6   | 7                        | 7  | 7   |
| Mean               | 3.65  | 3.13  | 4.35                                       | 2.43  | 4.09                     | 5.35   | 5.00  |
| Variance           | 4.96  | 3.66  | 1.96                                       | 2.26  | 2.54                     | 3.24   | 4.09  |
| Standard Deviation | 2.23  | 1.91  | 1.40                                       | 1.50  | 1.59                     | 1.80   | 2.02  |
| Total Responses    | 23  | 23  | 23   | 23  | 23                       | 23   | 23  |

\* Harmonize BHL Family of Portals: Ranked top priority by 7 people; second top priority by 9 people; lowest priority by 0 people

\* Better Linkages between BHL & EOL: Ranked top priority by 6 people; second top priority by 4 people; lowest priority by 1 person

\* Partner with Educational Publishers: Ranked top priority by 1 person; second top priority by 4 people; lowest priority by 8 people

\* K-12 Science and Art Programming: Ranked top priority by 1 person; second top priority by 2 people; lowest priority by 7 people

\* Expand Social Networking: Ranked top priority by 1 person; second top priority by 2 people; lowest priority by 1 person

\* Collect More User Feedback about Interface: Ranked top priority by 0 people; second top priority by 2 people; lowest priority by 2 people

\* Create Focus Groups: Ranked top priority by 7 people; second top priority by 0 people; lowest priority by 4 people