

# Hyku for Consortia - Toolkit Template

## Hyku Operational Model and Business Model Scenarios Template

### Overview

### Vision

For collaborating libraries to have agency in repository platform selection and management to effectively support both local and shared institutional and scholarly communications needs at scale.

### Mission / Objective

Together, we will develop and offer an affordable, open-source, and collaborative repository solution based on the Samvera Hyku platform.

### The Need

[Define the stated need for repository solutions within your organization(s).]

### Value Proposition

The multi-tenant Samvera-based Hyku platform, developed in part by the Hyku for Consortia project, represents a unique opportunity to serve a multitude of participating libraries with a community-owned, multi-purpose solution by leveraging scale and cost-savings achieved through shared administrative and technical infrastructure. Hyku strikes a balance between repository functionality, usability, and affordability, while also maintaining the flexibility to innovate and improve or change solutions as needed.

### Values

This collaborative repository will be operated in alignment with the following stated principles and values:

- **Cost-effective**, with a sustainable and controllable cost structure
- **Multi-tenant**, with individual branding, theming, and search per participant
- **User-friendly** to users of all types (librarian, faculty, student, etc.)
- **Open source**, and promoting open access to information
- **Community-owned** and supported by a diverse community of developers and service providers
- **Cooperative**, allowing collaborative management and decision making
- **Scalable** for use by groups and participating institutions of varied sizes and types

- **Interoperable** and allows free-flow of data with easy import and export
- **Flexible** in design and workflow
- **Customizable** based on a shared and user-centered approach to development
- **Comparable** in features with commercial repository solutions
- **Improvable**, allowing developments to be contributed back for community benefit
- **Future-facing** and not rooted in old technology structures

## Selecting a Hyku Business & Service Model

### Goals for discussion:

- Consider the needs of each partnering consortium / library
- Consider whether two or more consortia may collaborate to share costs, resources, expertise, services/support, and other infrastructure to offer cost-effective repository solutions to members.
- Consider and test the financial feasibility of offering Hyku services under a variety of potential service and funding models

## Example Model Scenarios:

### Scenario 1: Deep Collaboration : Consortial Partnership for Hyku Administration & Management

- a. Role for Consortia -- Two or more consortia administer and co-manage an instance of Hyku to offer consortia IR services via the Hyku platform
- b. Hosting -- Consortia could choose to:
  - i. self-host, or
  - ii. contract for hosting and/or software/technical support, depending on cost-effectiveness and staffing/technical capacity available from each consortium
- c. Staffing -- Consortia could
  - i. collectively support a shared position to manage IR services and service provider relationships, or
  - ii. each consortium could support their own membership base
- d. Funding -- Consortia could select the funding method determined by local need:
  - i. Cost-recovery, or revenue-generating payment for services; or
  - ii. Centrally funded venture
- e. Anticipated Costs:
  - i. AWS / Web hosting
  - ii. Support and Maintenance: Hosting/Software/Technical
  - iii. New Development (e.g., worktypes)
  - iv. Repository staffing at consortium level to manage shared aspects of the Hyku instance
- f. Cost Share Model:

- i. Evenly shared cost of shared technical maintenance and support by commercial service provider or in-house developer
- ii. Hosting costs shared based on % of costs attributed to use of AWS
- iii. Staffing costs shared or split, dependent on shared model v. individual consortial staffing/or teams depending on the needs of the consortia
- iv. Development costs for shared initiatives split
- g. Considerations/Risks
  - i. Hyku's limited metadata worktype management means collaboration could result in less customization / options for individual libraries, which could equal less value to libraries
- h. Potential Benefits
  - i. Greater ability to split costs, especially administrative, development, and staffing costs -- potentially the least expensive per institution
- i. Evaluation criteria:
  - i. Willingness to pay for Hyku measured at each consortium through pilots and needs analysis
    - 1. Need for service
    - 2. Adoption / # of members participating
    - 3. Customization needs
  - ii. Development needs
  - iii. Availability of other funding sources -- e.g., OER clearinghouse

#### Scenario 1 - Sample Budget

	Annual Total Costs	Notes
AWS / Other Server Storage & Processing Costs	30,000	These costs vary depending on storage and processing; May want to consider ideal file types and use cases
Technical Support & Maintenance	30,000	Bug fixes, Hosting support, upgrades, etc.
Software Development	30,000	Estimated development needed above and beyond hosting; Buffer as issues come up that require development efforts
Optional Add-on Services	Custom / Add-on cost	Examples include DOI services, Preservation services, other discovery integrations
Staffing	50,000	Time spent by consortial staff (salaries + benefits) to manage the service; accounting/finance; contracts
<b>Total costs</b>	<b>\$140,000</b>	

#### Scenario 1 - Sample Cost Share Models (Rough estimates only, estimated conservatively)

	<b>Consortium 1</b>	<b>Consortium 2</b>	<b>Notes</b>
AWS / Other Server Storage & Processing Costs	Split based on actual use	Split based on actual use	May split based on actual use of storage (used 50/50 split for estimating purposes); Consider possibly allowing unlimited use up to 1-3 TB to avoid disincentivizing use
Technical Support & Maintenance	\$15k	\$15k	Split evenly
AWS / Other Server Storage & Processing Costs	\$15,000	\$15,000	Split evenly
<b>Staffing</b>	\$25,000	\$25,000	Half-time support coordinator; half-time project manager; community liaison; finance and administrative support May be in-kind contributions that are shared based on expertise
<b>Total Costs</b>	\$70,000	\$70,000	
<b>Funding Models</b>	Central funding	Cost-recovery based on participation	Alternatively total costs may be distributed via a cost share formula for all participating institutions, regardless of consortium affiliation
<b>Estimated # Institutions</b>	24	15	
<b>Estimated ave. cost per institution</b>	\$2,920 per institution	\$4,667 per institution	

## Alternative Scenarios:

2. **One Consortium as Service Provider : One consortium providing services to one or more other consortia**
  - a. One consortium takes responsibility for all aspects of hosting, administration, support, and development efforts, whether in-house or outsourced
  - b. Offers repository services to other consortia to generate cost-recovery / net-revenue opportunities
  - c. Option to staff at the consortium level or contract for staffing
  - d. Considerations / Risks
    - i. Consortial Service Provider bears more risk should others not adopt the service
  - e. Benefits
    - i. Opportunity to create revenue, support staffing through generation of services
    - ii. Opportunity to offer to multiple consortia with less governance / shared decision-making

Scenario 2 - Sample Cost Share Models (Rough estimates only, estimated conservatively)

	<b>Consortial Service Provider</b>	<b>Consortial Customer</b>		<b>Notes</b>
<b>AWS / Other Server Storage &amp; Processing Costs</b>	\$30,000	Split across participating institutions		Based on use; could do additional cost recovery for high use by customers (e.g, >1 TB per repository)
<b>Technical Support &amp; Maintenance</b>	\$30,000	Split across participating institutions		
<b>AWS / Other Server Storage &amp; Processing Costs</b>	As needed	As needed		
<b>Staffing</b>	\$50,000			Dependent on rates/salaries, 2 Part-time or 1 Full-time *May apply a service fee or other cost recovery mechanism
<b>Total Costs</b>	<b>\$110,000</b>			Services could be offered to more than 1 consortium's members; Revenue generated helps to offset risk and benefits the hosting consortium
<b>Funding Models</b>	Cost share	Cost share + plus service fee		
<b># Institutions</b>	24	10	Total repositories : 34	Any institutions brought on would reduce the costs to the host provider
<b>Est Ave. Cost per institution</b>	\$3,236 per library	\$3,236 + Service fee		Estimated cost for service provider is total cost of running the system; Revenue from consortial customers would reduce cost to service providers over time and could generate revenue positive results, depending on # of libraries buying service

**3. Commercial Service Provider : Contractual relationship with a vendor to fully support the open source platform and services**

- a. One service provider takes responsibility for all aspects of hosting, administration, support, and development efforts, with consortia contracting either jointly or separately for Hyku instances

- b. Option to staff at the consortium level or contract for staffing with other consortia
- c. Considerations / Risks
  - i. Commercial Service Provider controls costs
  - ii. Likely more expensive
  - iii. Consortial staff will still need to retain expertise
- d. Benefits
  - i. Service provider may offer added scale / coordination with other groups using the service