



DSPACE

Digitization a library through Institutional Repository

Introduction to DSpace

Why Digitization Matters and Exploring Key Features

**Prepared by
Digital Solution Bangladesh**

Why DSpace is Essential for Libraries

- **Digital Transformation: Transition from physical archives to digital repositories.**
- **Preservation of Resources: Long-term access to research and academic content.**
- **Global Visibility: Increases discoverability of resources worldwide.**
- **Supports Open Access: Encourages free exchange of scholarly work.**

Key Benefits of DSpace

- **Customizable and Scalable:** Fits the needs of small and large institutions.
- **User-friendly Interface:** Simplifies repository management.
- **Interoperability:** Compatible with third-party systems via APIs.

Basic Features of DSpace

- **Content Management:** Store and organize digital content. Support for diverse file formats.
- **Customizable Interface:** Adapt design to meet institutional branding.
- **Metadata Support:** Ensure content discoverability using standards like Dublin Core.
- **Search and Retrieval:** Advanced search capabilities.
- **Preservation:** Robust tools for long-term preservation.
- **Integration:** APIs and support for external systems.

Advanced Search and Browse

- **Search Options: Keyword and advanced searches with filters.**
- **Browsing by Fields: Discover content by author, subject, or date.**

Hands-on Practice

Goals for this session:

- **Learn basic operations in DSpace.**
- **Gain confidence in managing digital content.**

Activities Overview:

- **Create communities and sub-communities.**
- **Add metadata and lock files.**
- **Submit and manage content.**

Login to Repository

Steps:

1. **Navigate to the repository URL:
<https://repository.sau.ac.bd>.**
2. **Click the Login link (typically in the top-right corner).**
3. **Enter your username and password, then click Sign In.**

Note:

- **Ensure your account is set up by the administrator for appropriate permissions.**

Resetting Password

Steps:

- 1. On the login page, click the Forgot Your Password? link.**
- 2. Enter the email associated with your DSpace account.**
- 3. Check your email for a password reset link and follow the instructions to create a new password.**

Important:

- Contact the system administrator if the email is not received.**
- Use strong passwords to enhance security**

Creating a Community

Steps:

1. **Navigate to the DSpace dashboard.**
2. **Select right Navigation > Communities and Collections.**
3. **Click Create Community.**
4. **Add details (name, description, logo).**

Purpose:

- **Organize content by departments or projects.**

Creating a Sub-community

Steps:

1. **Select the parent community.**
2. **Click Create Sub-community.**
3. **Fill in required information.**

Example Use Case:

- **A department (parent) with specific research groups (sub-communities).**

Entering Metadata

Importance of Metadata:

- **Ensures discoverability and accurate categorization.**

Steps:

1. **During item submission, fill out metadata fields (e.g., Title, Author, Keywords).**
2. **Use standards like Dublin Core for consistency.**

Introduction to Dublin Core

What is Dublin Core?

A metadata standard for describing resources like documents, images, and videos.

Contains 15 core elements (e.g., title, creator, date, etc.).

Default Dublin Core Fields in DSpace

Predefined Fields:

- Title
- Creator
- Subject
- Description
- Publisher
- Contributor
- Date
- Type
- Format
- Identifier
- Source
- Language
- Relation
- Coverage
- Rights

Item/Content/Article Submission

Steps:

- 1. Go to the target community or collection.**
- 2. Click Submit Item.**
- 3. Add metadata, upload files, and set permissions.**
- 4. Review and complete the submission.**

Key Points:

- Include all required metadata.**
- Verify file uploads before finalizing.**

Restrict Permission to View or Download a PDF File in DSpace

Why Restrict Permissions?

- **Protect sensitive or restricted content.**
- **Control access to copyrighted materials.**

Steps to Restrict Permissions in DSpace 6:

1. **Log in with an administrative account.**
2. **Navigate to the specific item in the collection.**
3. **Click Edit Item and go to the Item Permissions tab.**
4. **Remove view/download permissions for unauthorized users.**
5. **Assign roles or user groups for restricted access.**

Taking a Backup of DSpace

Why Backups Are Important:

- **Protect against data loss from hardware failures or accidental deletions.**
- **Ensure repository continuity in case of disasters.**

Frequency:

Perform daily or weekly backups depending on repository activity.

Taking a Backup of DSpace

Steps to Backup DSpace:

- **Database Backup:**
 - Use PostgreSQL tools: `pg_dump` for full database export.
 - Command: `pg_dump -U [db_username] -F c [db_name] > dspace_backup.sql`
- **Assetstore Backup:**
 - Copy the assetstore directory to a secure location.
 - Command: `rsync -av /path/to/assetstore /path/to/backup/`
- **Configuration Files:**
 - Backup files in `/config` and custom configurations.
 - Command: `tar -czvf dspace_config_backup.tar.gz /path/to/config/`

Our Clients who uses DSpace in Bangladesh

- **Independent University, Bangladesh (IUB)**
- **Jahangirnagar University**
- **Caritas Development Institute**
- **Eastern University**
- **Daffodil International University**
- **Asian University for Women**
- **Chief Advisor's Office**
- **Sylhet Agricultural University (SAU)**
- **and many more**

Conclusion and Q&A

Key Takeaways:

- **DSpace is a powerful tool for digital repository management.**
- **Digitization enhances access, preservation, and collaboration.**
- **Practical knowledge helps leverage DSpace features effectively.**

Q&A Session:

Open the floor for questions and discussions.

Thanks !