



3drepo.io User Manual

Version 1.12

Welcome

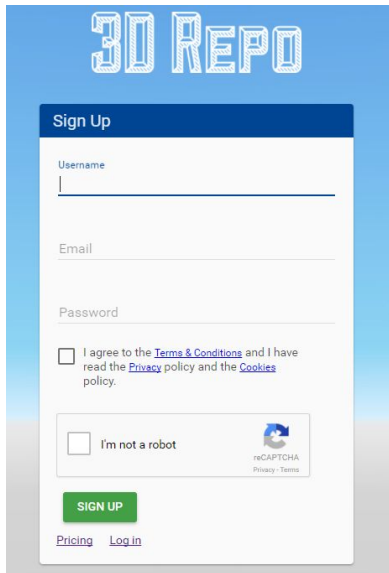
3D Repo is an easy to use online BIM platform and this user manual is aimed for all users, from hobbyists to professionals. Topics covered are:

- User Interface
- Integration of 3D Repo to your workflow
- Basics of 3D Repo infrastructure

User Interface

Sign Up

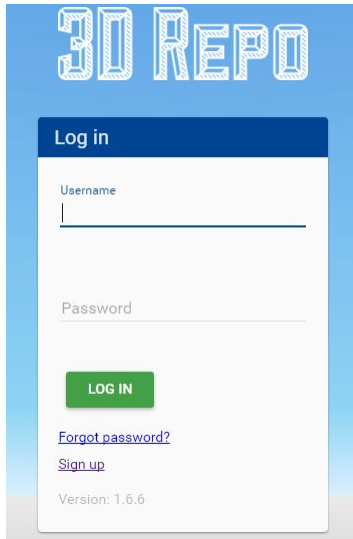
1. Go to <https://www.3drepo.io/signup>
2. Fill in required user details and hit SIGN UP button
3. Verification email is sent, open it and click on the link
4. Log in to 3D Repo



The image shows a screenshot of the 3D Repo sign-up page. At the top, the '3D REPO' logo is displayed in a stylized, outlined font. Below the logo is a 'Sign Up' form with a blue header. The form contains the following elements: a 'Username' input field, an 'Email' input field, and a 'Password' input field. Below the password field is a checkbox for agreeing to the 'Terms & Conditions', 'Privacy policy', and 'Cookies' policy. Underneath is an 'I'm not a robot' checkbox and a reCAPTCHA widget. A green 'SIGN UP' button is located at the bottom of the form. At the very bottom of the page, there are links for 'Pricing' and 'Log In'.

Log In

1. Go to <https://www.3drepo.io>
2. Fill in login details and hit LOG IN button
3. Once you logged in you will see list of your projects

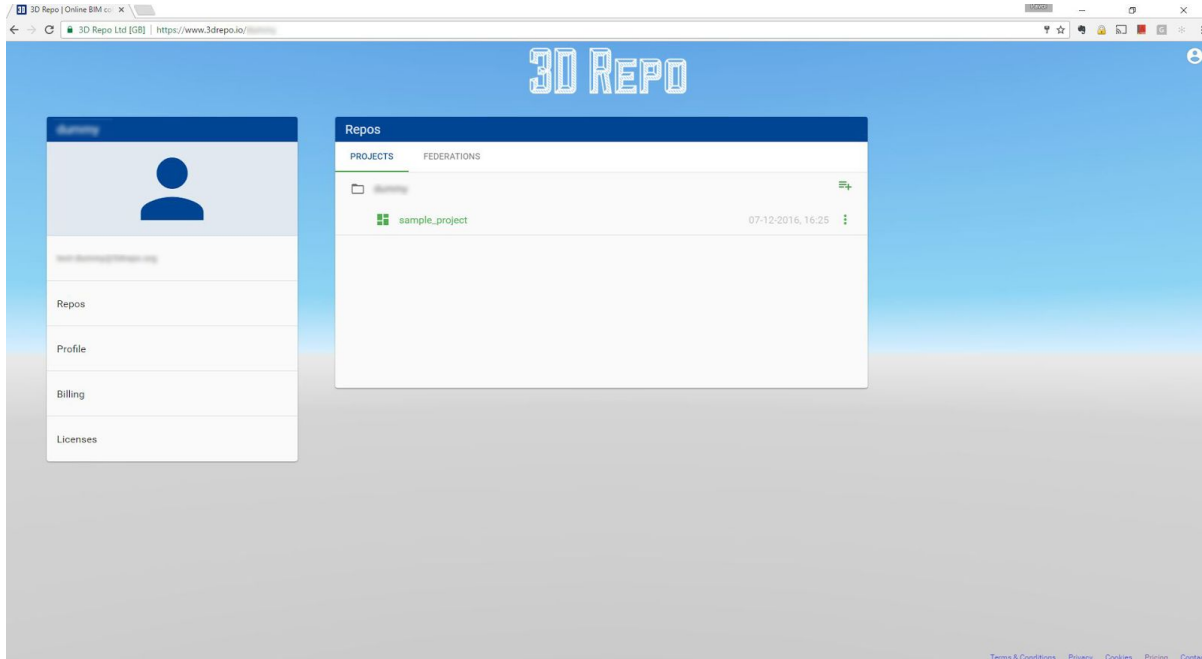


Repos

What is Repo? Repo is a shorthand for [repository](#) and it is your space in the cloud where you can store your projects. Every user has his/her own repository which can be shared with other members of the team.


After login, you will see your repo with a sample model and any other repos shared with you by other users. To open a model simply click on its title.


[Sample project is provided by Rob Jackson from Bond Bryan.](#) Thanks Rob!



Projects

Create Project

1. Click the plus icon  in the top right corner of projects panel
2. Fill in name, specify type and units
3. To upload a model, click **UPLOAD FILE**, locate model to be uploaded and hit **OK**
4. Click on the project name to load it
5. Model is opened in 3D Repo viewer

Additional options are available from the Project menu  :

Upload File - New Revision

To upload a new revision of the model, go to Project menu and select Upload file. Pop up window appears where you can specify name of the revision and its description.

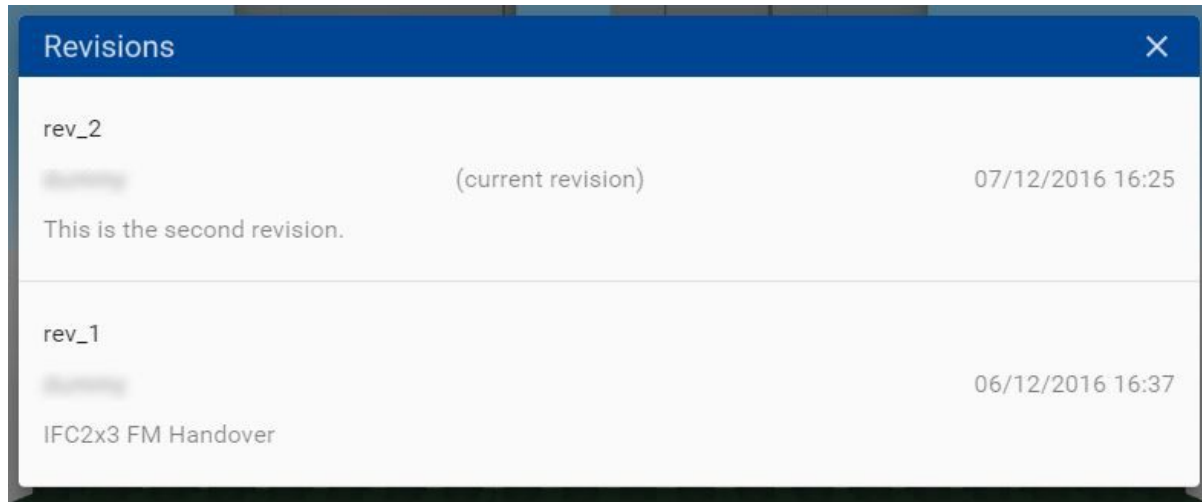
Download

The original model file can be downloaded from the Project menu.

Revisions

3D Repo is a version control system and each revision of a project can be accessed from the

Project menu



Delete

Projects can be deleted for the Project menu.

Federations

Create Federation



1. Click the plus icon in the bottom right corner of the Federations panel
2. Type the name of the federation
3. Specify the units
4. Select models to federate from available models
5. Hit the SAVE button

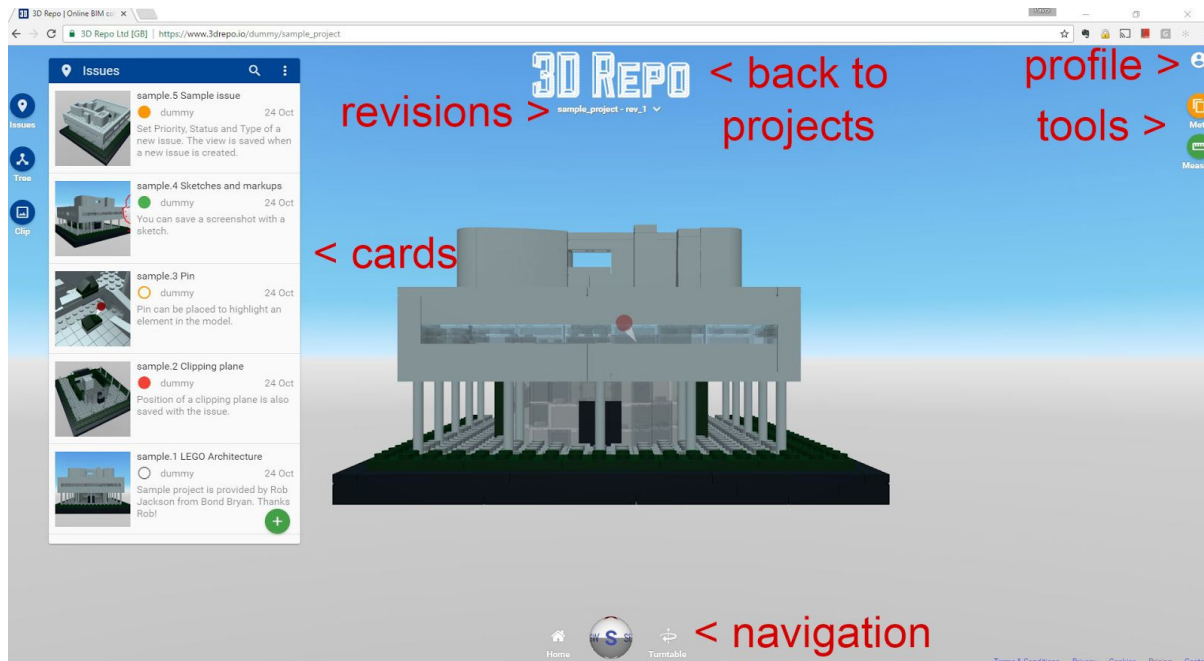
To open a federation simply click on its title.

Billing

<http://3drepo.org/pricing/>

3D Viewer

3D Repo Viewer runs on [WebGL](#) and our technology exploits the capabilities of modern browsers to the limit in order to render large BIM models common in construction and infrastructure projects. Loading large complex models may take up to several minutes. We recommend 8GB of RAM and Chrome, Firefox, Edge or Opera web browsers for the best experience.



Navigation

Navigation modes:

- Turntable (default)
- Helicopter
- Walking



Home button resets the view and the whole model is visible.



Click on the Compass to hide/show user interface elements.

Navigation



Turntable



Rotate



Pan



Zoom



Helicopter



Move forwards &
backwards
Turn left & right



Change view angle



Move up & down
Move sideways

Clip






1. Click the blue Clip button at the left edge of the screen, a Clip card will appear
2. Select the axis, move the slider to clip the model
3. Eye icon in the header of the Clip card activates/deactivates clipping


Issues



3D Repo allows users to comment, draw mark-up, place pins and save views in the model. All features can be utilised and saved within one issue.


1. Issues card is opened by default, you can switch it on and off by clicking the blue Issues

button  on the left edge of the screen

2. Create a new issue by clicking on the green plus button  at the bottom right corner of the card
3. Write the title of the issue
4. Set Priority, Status, Type
5. You can write a description to provide more information about the issue
6. To create a Scribble click on the Screenshot button  at the bottom of the card.

Draw tool is active by default and you can sketch immediately. Select Eraser  to delete your sketch.


7. Hit Save button  once done.
8. To place a pin, activate the Pin tool  and place a pin on any geometry within your model.

9. Hit Submit button  to save the new issue to 3D Repo database.

Description, Scribble and Pin are optional features, the bare minimum for an issue to be created is the title.



Icon below the issue title indicates status and priority.

If you are using a small screen and you want to gain more space for comments in the issue card click on the arrow  to collapse the issue's options panel. You can also adjust size of UI elements by presing CTRL + or CTRL - on your keyboard.

Press the back button  to return to the list of all issues.


Assign

Assign an issue to role from the drop down menu.


Close

Once an issue is clarified and no longer needed, it can be flagged as closed.


1. To close an issue, open it and change its Status to Closed


It will disappear from the list, it is however saved in the database and all closed issues can be accessible again by toggling Show resolved issues command from the menu  in Issues header.

Print

Complete list of issues can be also printed with Print command in header menu . Use browser's print wizard to send it to your local printer or save as PDF.

Filter

Number of issues can grow fast and Filter tool helps to search through them. Activate the Filter  in the Issues header and start typing, list of issues is filtered immediately. To reset the

Filter click the X button 

Tree



Tree card shows all objects and their hierarchy within the 3D model.



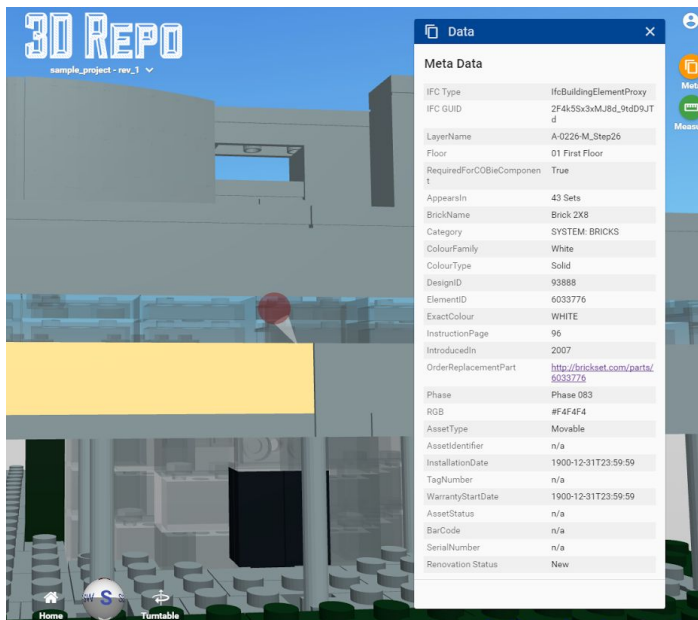
Plus button expands/collapse the hierarchy of the tree. Eye button controls object's visibility. Object selected in the tree is highlighted in the 3D view.



To filter objects in the tree click on the Filter button  and enter desired keyword.

Metadata

Objects in BIM models contain data of all sorts. This is displayed in a pop up card which appears when an object is selected.



Metadata is enabled by default and the Meta button is orange. Click the button to switch off the metadata.

Measure





1. Click on the green Measure button on the left edge of the screen to activate the tool
2. Pick the first point and the second point on the model.
3. A pop up with measured values appears. "L" is the distance between points, "X", "Y", "Z" are distance along the grid axes. "Z" is the vertical distance.


Revisions

3D Repo is a version control system and each revision of a project can be accessed from the




Project menu  or in the 3D view . Title and revision name of a model is displayed in below the 3D Repo logo at the top of the view. You can click on the model title to see all revisions.

Revisions		
rev_2	(current revision)	07/12/2016 16:25
This is the second revision.		
rev_1		06/12/2016 16:37
IFC2x3 FM Handover		

To go back to Projects from the 3D view click on the 3D Repo logo or choose Projects from the Profile menu  .

Log out

To end the session select Logout from the Profile menu  .

Workflow

Formats

3drepo.io supports more than 40 formats which can be uploaded to cloud and rendered in the viewer. Most common are IFC for BIM packages and FBX, OBJ, DAE for imports from other tools.

IFC

Recommended IFC export settings for the best results in your BIM workflow:

Revit

IFC2x3 Coordination View 2.0 or IFC2x3 Extended FM Handover View

Archicad

General Translator

Coordinates

Whether it is a new revision or another model in federation, all your models need to share the same coordinates system to avoid any issues in 3D Repo or construction site.

[About Revit Shared Coordinates](#)

Units

All models have to be in the same units when uploaded to 3drepo.io. Some exports give an option to change units but don't scale model, for example FBX export from Navis.

Project units can be specified in project settings accessible through menu button in the project list.

3drepo.io Infrastructure

3drepo.io is a cloud repository running on top of a NoSQL database MongoDB. All servers are located in the UK.