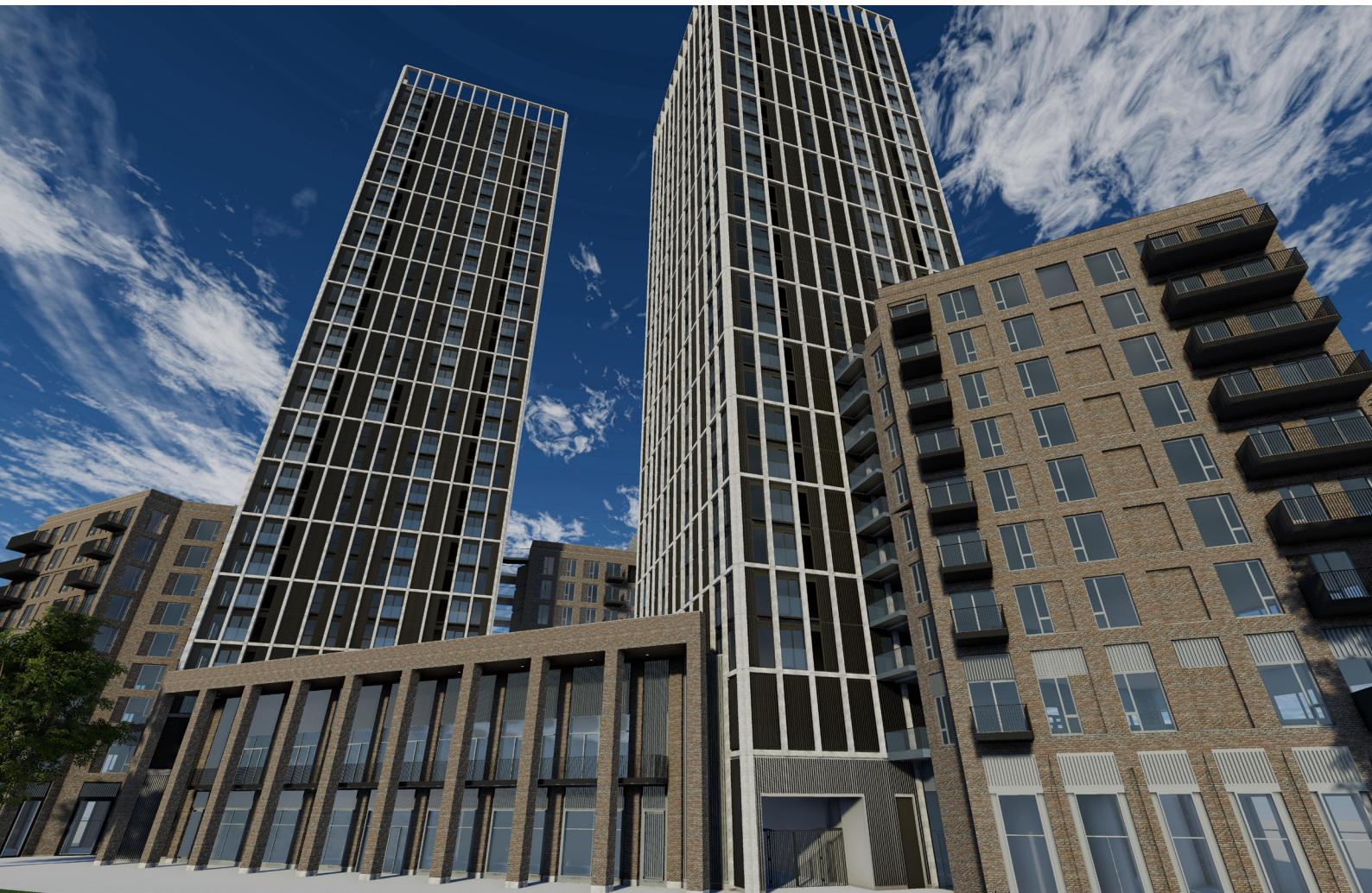


3D REPO

High-Impact 3D BIM
Visualisation



luminova
VISUAL TECHNOLOGY

MISSION ROOM 
360° Innovation

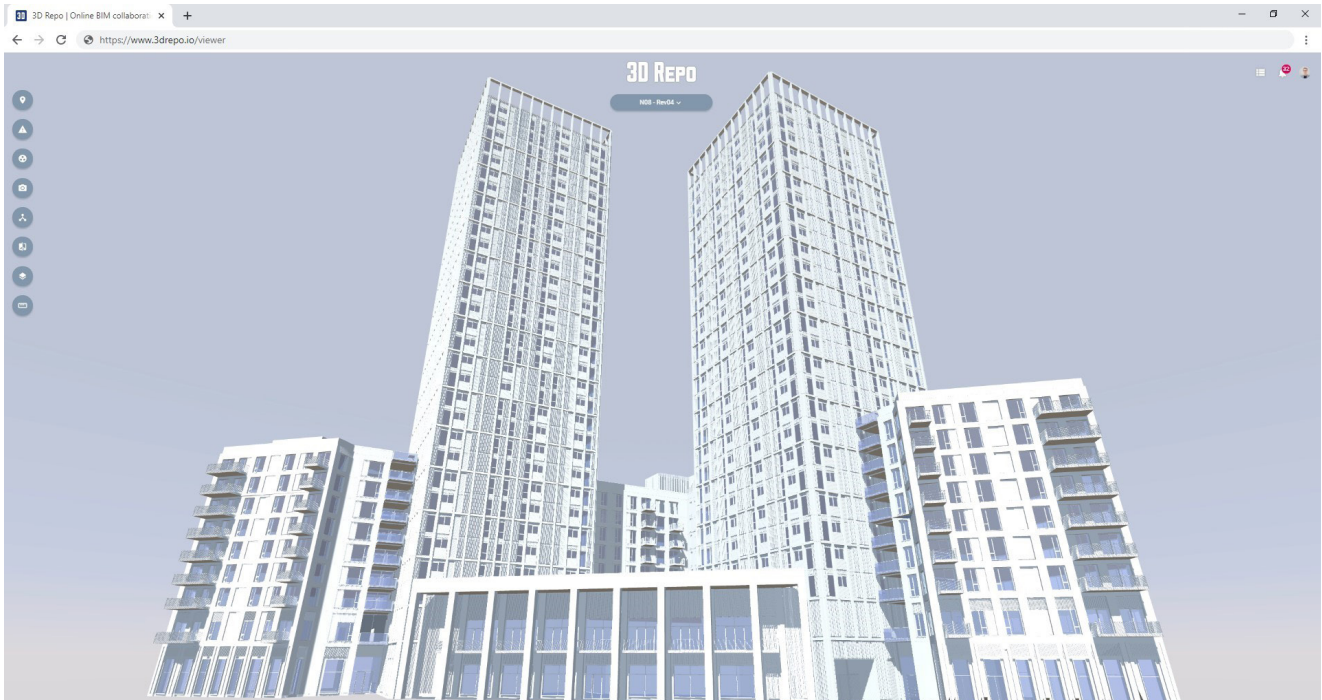


Figure 1: 3D BIM models are uploaded to 3D Repo's cloud-based digital construction platform for architects, engineers, and construction to collaborate.

Manage BIM Data with 3D Repo

The Architecture, Engineering, and Construction (AEC) industry is infamous for errors, omissions, overruns, and spending substantially more money than budgeted. All of which could easily be prevented through proper communication, coordination and collaboration.

On a mission to help create a better built environment, 3D Repo developed cloud-based digital construction platform for Building Information Modelling (BIM) that [democratises data, mitigates risk, and reduces complexity](#). 3D Repo allows users to manage 3D model revisions and highlight potential issues using live collaboration tools which enable the whole project team to work from a single source of truth anywhere and at any time.

Open Communication & Collaboration

Teams no longer need to send emails or large files to each other. Instead, collaborating teams can share issues and communicate with ease, with access to shared 3D models through a web browser whenever and wherever they are. Teams collaborating in different offices, regions or even different countries can share issues and communicate instantly.

Safer Construction

SafetiBase allows users to identify and mark up issues and potential hazards to mitigate safety risks before any construction takes

place. SafetiBase also conforms with PAS 1192-6 specification for collaborative sharing and use of structured Health and Safety information using BIM.

Designed for communicating, managing, and visualising health and safety risks, SafetiBase brings structured data with a common schema, allows data to be connected, and is simple to use with no prior knowledge required.

Progress Tracking & Data Analytics

Easily connect 3D Repo to powerful business intelligence tools such as Microsoft Power BI, Node-RED, and Dynamo to create custom dashboards and reports to track progress and make informed decisions.

3D Repo has also undergone independent verification through [BSI](#) to achieve the highest standards of information security, privacy ([ISO 9001, cert FS693488](#)), and management processes and controls ([ISO 27001, cert IS693487](#)).

3D Repo has already helped their clients to...



Mitigate Risk & Reduce Cost



Accountability & Transparency



Meet Project Deadlines

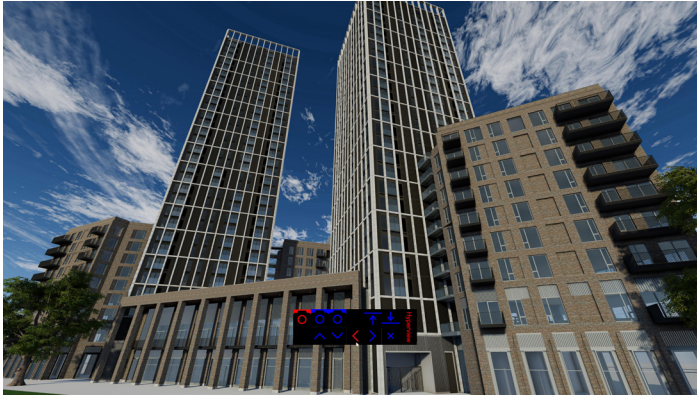


Figure 2: The realistic 3D model created by Luminova using BIM data from 3D Repo.

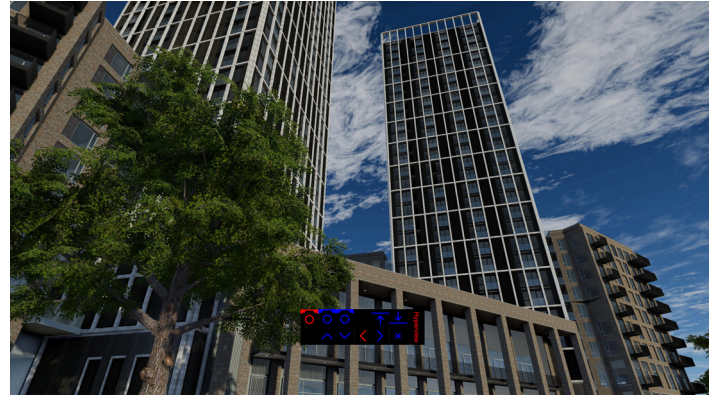


Figure 3: A alternative view of the realistic model created by Luminova.

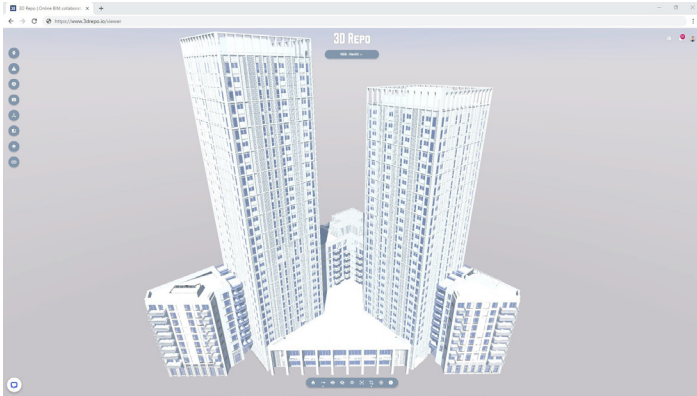


Figure 4: Model in 3D Repo. Luminova uses this data to craft a realistic 3D model.



Figure 5: Luminova and 3D Repo can be viewed on Mission Room's visual solutions.

Sync with Luminova for Realistic 3D

The opportunity to create realistic 3D models for client presentation purposes inspired a partnership between [3D Repo](#) and [Luminova](#); a leading 3D content creation company with expertise in creating highly engaging and realistic 3D visualisations. The detailed models crafted by Luminova allow you to virtually walk-through construction projects to gain a better understanding of the complexities, risks, and solutions.

Luminova have created highly detailed 3D models for many high-profile projects including [London Heathrow Airport](#), [King Abdullah International Gardens](#), and a [new development in London](#).

Luminova create Unity application that work in conjunction with your 3D designs and independently give the client another means of 3D delivery within a real time environment to explore projects at full scale. These models help to effectively communicate the vision of a project and are highly engaging.

A back-end integration between Luminova and 3D Repo allows the client to have their complex 3D BIM models transformed into ultra-realistic 3D renders using your BIM model data. As shown in Fig 2, the BIM model data of the new development in London

has been pulled down from 3D Repo, and used to create a highly realistic visualisation for the client. The models have been populated with interactive model elements, allowing the client to click and interact with different objects to view more information and gain a deeper understanding of the project, without the complex BIM and construction data.

Clients can also have access to Luminova's Estate Management Tool, Hyperview. Hyperview is a desktop application that allows the client to view larger and more elaborated versions of the model to include textures, traffic, and other meaningful data. This is especially useful with large models that require more computing power.

All of the available 2D data can be gathered via an API and applied to the 3D geometry including volumetric data, availability and leasing data, sequencing, and any other data from your own database. Luminova's services also include 3D modelling, construction sequence simulation, visualisation, animation, CGI, rendering, and post production. For a more detailed list visit luminovauk.com.



BIM models are easily downloaded to Luminova





Figure 6: Both 3D Repo and Luminova systems work natively with Mission Room's High-Impact Visualisation solutions.

Add Mission Room for High Impact

To further improve efficiency, [Mission Room's highly engaging visualisation solutions](#) can also easily integrate with both [3D Repo](#) and [Luminova](#) technology. Mission Room are experts in capturing, processing, and delivering 360-degree video to a wide range of clients in the AEC industry.

The integrations allow Mission Room to easily display 3D BIM models from 3D Repo, and the highly realistic 3D models from Luminova as shown in Fig 6 - the new development in London.

Key benefits of Mission Room:

- Democratising data for all stakeholders;
- Large displays enhance training and collaboration;
- Speed up decision making and minimise time scales;
- Reduce costs with fewer visits to site models.

The Mission Browser is a 360-degree multi-screen web browser that enables the 3D Repo platform, and 3D models by Luminova to be displayed across multiple touch-enabled screens for an even more immersive experience. Screen options range from portable

desktop to 3x3m [Cube](#) or 6m wide [Cine](#) allowing multiple engineers to collaborate with the 3D models.

Mission Room can also be used to explore enhanced 3D models by Luminova for client and other presentation purposes. Mission Room's large displays make for a truly engaging experience for all stakeholders, allowing you to virtually walk-through your models.

Being able to step inside the model gives greater understanding and knowledge of the site before any construction takes place. Not only does this reduce expensive site visits, but it also aids in better planning and fewer mistakes and meeting project deadlines

Use Mission Room to...



Gain greater depth of insight



Undergo digital rehearsals and walk-throughs



Deliver powerful and unique experiences

Get in touch today

3D Repo: sales@3drepo.com

Luminova: info@luminovauk.com

Mission Room: info@missionroom.com

<https://3drepo.com>