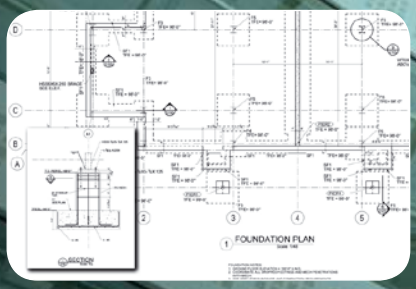
TEKLA® Structures

ENGINEERING



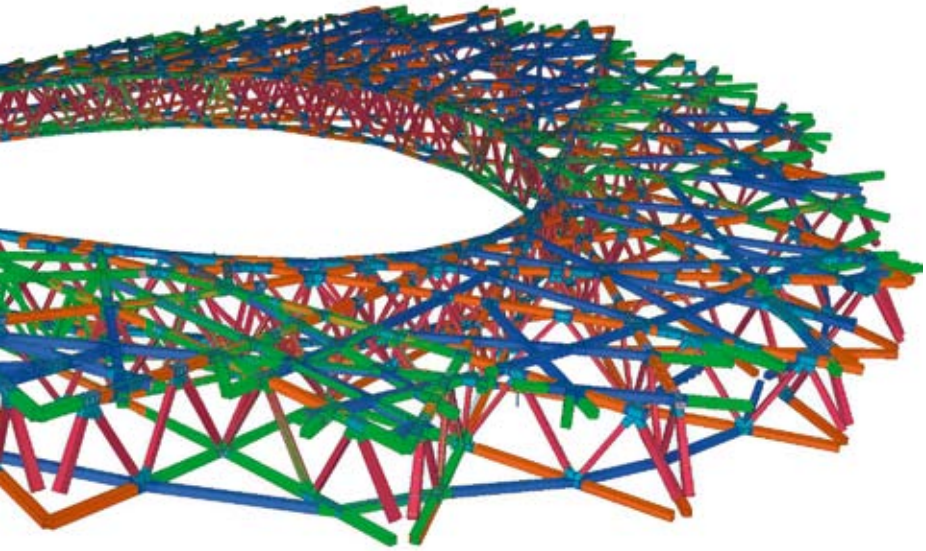
TEKLA STRUCTURES MATERIAL LIST FOR CONTRACT No:12345 Page: 1
TITLE: Building Date: 14

Size	Grade	Qty.	Length(mm)	Area(m²)	Weight
50*11950	K40-1	2	18300	447.2	78726.
50*11950	K40-1	2	18300	447.2	91847.
			73200	1788.9	341148.
175*9000	K40-1	2	9145	104.2	19770.
			18290	208.4	39540.
600*600	K40-1	8	6375	16.0	5807.
			50999	128.2	44063.
900*600	K40-1	8	7175	22.6	9288.
			57399	180.8	74389

Tekla Structures – There's one tool that does the job

TEKLA Structures

HOW DOES YOUR DESIGN SOFTWARE COPE...

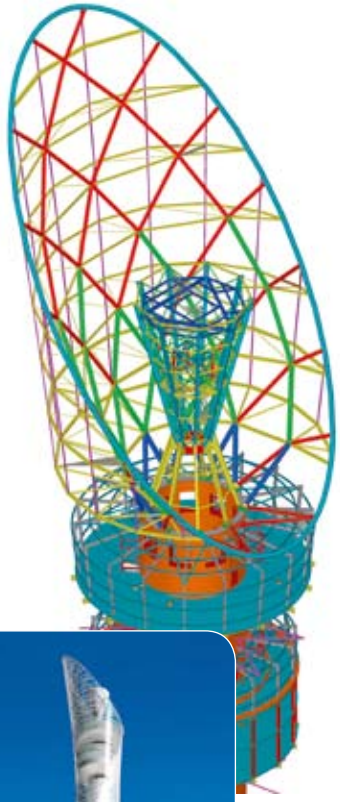


Olympic Stadium 2008, Beijing, China, model courtesy of Shanghai Haorong Construction Technology Co., Ltd

- *IN MEETING YOUR CLIENTS' INCREASING NEEDS ON DELIVERABLES, DEMANDING STRUCTURES, SCHEDULES AND CHANGES?*
- *IN MANAGING CHANGES THAT MAY HAVE A MAJOR IMPACT ON THE COST AND THE SCHEDULE OF A PROJECT?*
- *IN IMPORTING DATA FOR DIFFERENT NEEDS AND AVOIDING INFORMATION LOSS AND ERRORS DURING THIS PROCESS?*
- *IN OFFERING YOUR EMPLOYEES – YOUR COMPANY'S BEST ASSET – THE MOST MODERN AND EASY-TO-USE TOOLS?*

Neste Oil, Porvoo, Finland, model courtesy of Pöyry Civil

THERE'S ONE TOOL THAT DOES THE JOB



All changes take time to get used to, but once you are up and running, the benefits will make the change worth your effort. Tekla Structures offers a better way of working for engineering offices in General Design, especially in large time-critical and information-rich projects.

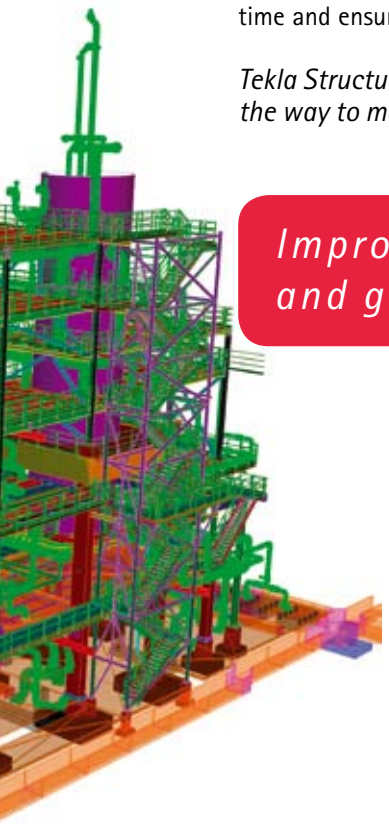
- Greater modeling speed allows more alternative solutions to be explored and lets you compete for more complex and prestigious contracts.
- Powerful visualization and accurate cost estimates help you win more projects.
- An integrated, more efficient overall process reduces project cycle time.
- Less design errors and request for further information reduce costs.
- Better quality of work builds up your reputation.
- Increased efficiency lets you cultivate new business opportunities.

In addition to efficient design, output, change management, and multi-user collaboration, Tekla Structures can easily integrate with other systems, such as architectural, process layout, and analysis & design solutions.

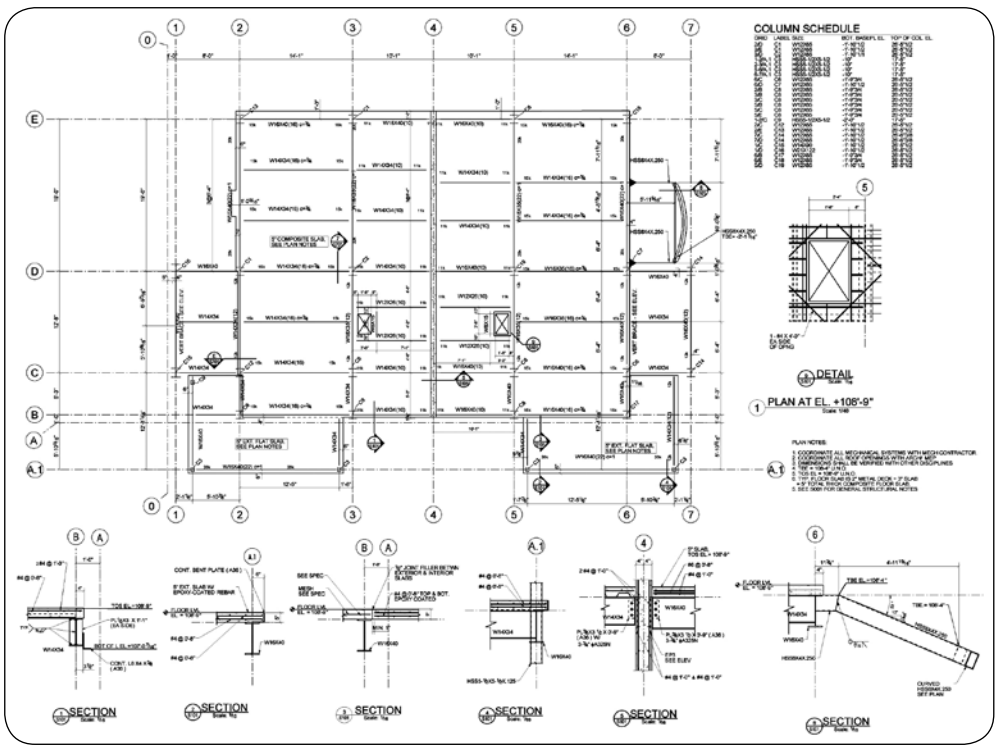
The structural model that you create can also be of value for detailers, steel fabricators, precast manufacturers, and contractors. Using the same model saves time and ensures quality projects that benefit everyone involved.

Tekla Structures is the one tool that does the job from conceptual design all the way to manufacture, construction and site management.

Doha Tower, Qatar, UAE, model courtesy of Arup



Improve your performance today and get ready for TOMORROW!



Generate up-to-date drawings directly from the model

TEKLA STRUCTURES FOR ENGINEERING

Collaborate

Collaboration with different project teams, internal and external, is the bulk of what engineering work is today. Mastering the massive amount of information and changes is essential for quality projects.

- Communicate your conceptual design alternatives with ease and accuracy
- Use the information rich model and its impressive visualization tools to support your presentations
- Work simultaneously on the same model with others regardless of location
- Enter information only once and share it in its most up-to-date form throughout the process
- Use industry-standard formats, such as IFC, CIS/2, SDNF, DGN and DWG
- Monitor progress of the project with all project team members through built-in 4D tools

Design

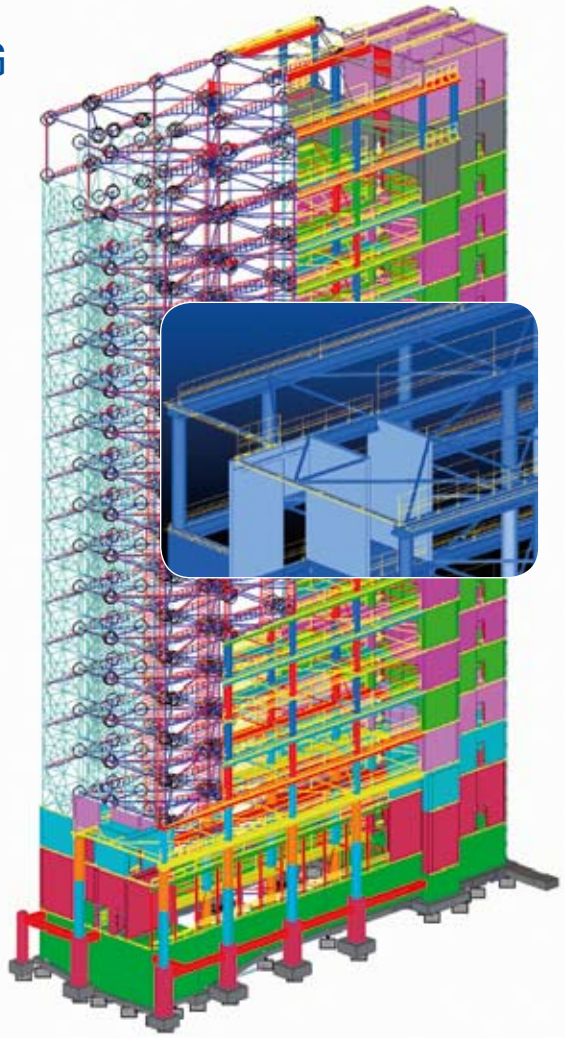
Understanding the building and its design options is what quality design is all about. This involves visualizing the projects and having the right tools to change ideas into practice.

- Focus on essential design decisions by freeing up time using automated routine tasks, extremely powerful modeling, and an integrated, faster workflow
- Design in real-time 3D with an accurate, fully object-based model and utilize the model or parts of it in your preferred A&D solution. Once analyzed, update the model with the resulting data – no more duplicate modeling!
- Whenever you need to make changes, do them in the model – all related output reacts to the changes automatically
- Use automated clash checks to expose conflicts before they become a problem

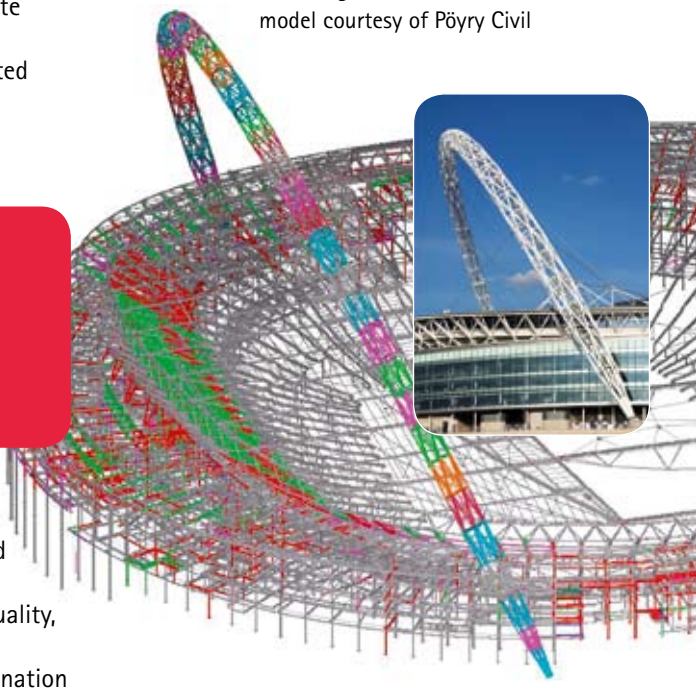
Deliver

The final deliverable, in the form of either reports or drawings, is a means to communicate the design. Quality output in plans, elevations, details, and reports is required for an error-free project.

- Meet your clients' increasing needs of deliverables
- Generate up-to-date contract drawings and reports at any time throughout the process from the intelligent model, which is embedded with all material, structural and technical project information
- Continue to use the same model for detailing and ensure your high-quality, error-free project
- Deliver the model to contractors and fabricators for the project coordination



Use the Tekla Structures model in analysis and design. Panorama Tower, Finland, model courtesy of Pöyry Civil



Wembley Stadium, London, UK, model courtesy of Oakwood Engineering

WE COULDN'T HAVE SAID IT ANY BETTER...

"Ramboll Finland was among the first users of the new general release of Tekla Structures. Our target is to cover 100% of our designs with Tekla Structures. There is no doubt whether we will meet this target or not because we will not accept any other possibility. Our designers are very motivated to use the kind of design method that enables them to avoid design errors. This is important for the whole building process. In addition to general design tasks, Ramboll Finland has made several R&D tasks for its clients in order to develop Tekla Structures Custom Components for the producers of different construction components, including suppliers of steel structures, concrete elements and connectors. Our structural design unit in Finland employs over 100 engineers, each unit having specific roles and detailed customer segments. We have learned how to select the most effective design group for each project. By using Tekla Structures in the multi-user mode we have maintained a very successful design approach both in industrial, commercial, public and residential projects, covering not only structures in steel, but also in concrete, precast concrete and timber."

Ismo Tawast
Director of the Building Construction Division
Ramboll Finland
www.ramboll.com

"Tekla Structures is revolutionizing the design and implementation methods for prefabricated and other types of building. At Finnmap, the high speed of modeling that this affords has enhanced design work, in particular during the sketching and tendering phases. We have been able to model several alternative solutions for our customers, and provide visualizations and material quantity estimates. Without Tekla Structures and its so-called 4D design feature, it would have been impossible to optimize the selection of the right structural solutions, installation methods and routes, and ensure the modifiability of a building throughout its lifecycle, all accomplished during the structural design phase. We have enjoyed great success in optimizing site operations and the order of the installation process, utilizing a 3D model of the building, alongside the installation time as a 'fourth dimension'(4D). The product model provides an excellent way of verifying the precision and accuracy of the geometry. Tekla Structures largely eliminates geometrical errors, and even last-moment changes are easy to perform in a single attempt."

Tage Eriksson, M.Sc.(Eng.)
CEO
Finnmap Consulting Oy
www.fmcgroup.fi

"The decision to move forward with CAD was reasonably straightforward. We needed to work in a 3D object-modeling environment. We model in both steel and concrete, and Tekla Structures is the best steelwork package on the market. The fact that Tekla Structures is a multi-material modeling system helps the structural geometry stay consistent. The exceptionally smooth collaboration and information management applications make the overall process controllable. The same model can be utilized for producing analysis & design results and reports. Our General Arrangement drawings are much more accurate. We get more from the 3D model in the way of views and details. The Tekla Structures visualization capacity provides us with superior image quality. At the end of the day, your 3D model will most probably end up in Tekla Structures, so why not start with it!"

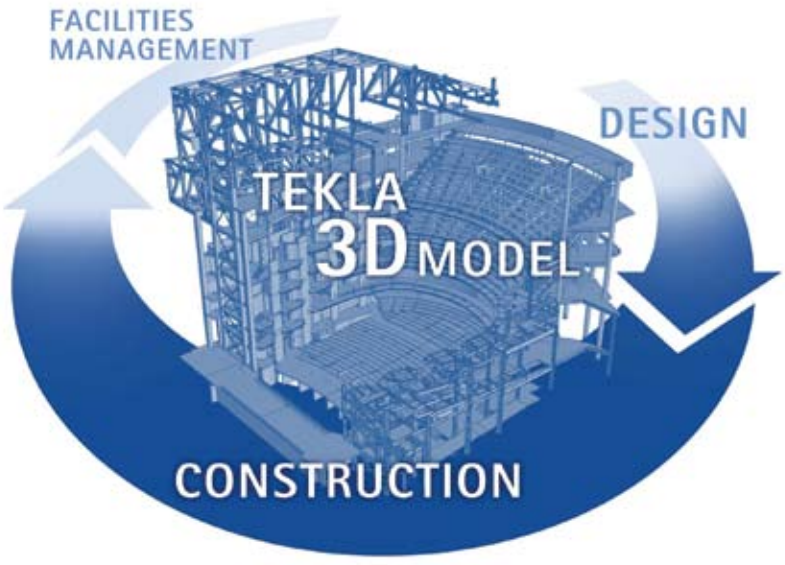
Ray Young
CAD Leader
Arup London
www.arup.com

WANT TO KNOW MORE?

Tekla Structures encompasses specialized configurations for structural engineers, steel detailers and fabricators, precast concrete detailers and manufacturers, as well as contractors. Thousands of Tekla Structures software users in more than 80 countries have successfully delivered BIM-based projects across the world. Every year Tekla invests up to 20% of revenue in R&D to provide you with the leading and most advanced solutions on the market. The Tekla team of skilled professionals provides all the technical support you need.

TEKLA CORPORATION

Tekla is a leading international software company whose innovative software solutions make customers' core businesses more effective. Tekla's software products and related services are used mostly in building and construction, but also in energy distribution and by municipalities. Tekla Corporation has area offices and partner organizations worldwide. International operations account for 80% of net sales. Founded in 1966, Tekla is one of the oldest software companies in Finland.



With Tekla, building information modeling means wider usage of the structural model: accurate and error-free coordination of every material in every stage of design and construction.

CONTACT
Tekla Corporation
Headquarters
Metsänpojankuja 1
02131 Espoo
FINLAND

Tel. +358 30 661 10
Fax +358 30 661 1500

www.tekla.com