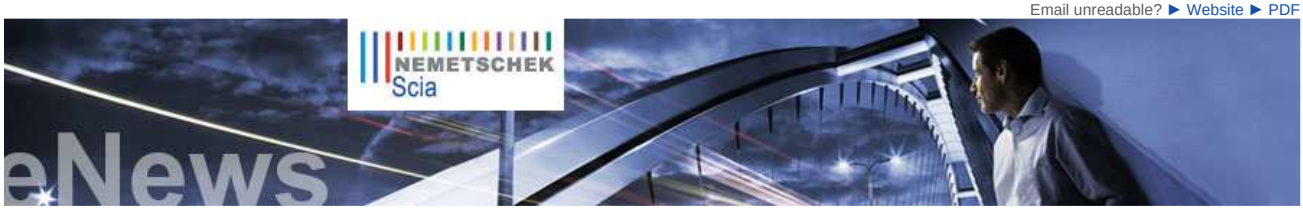

May 2010

Latest News & Events

- ► **Press Release**: Nemetschek Scia starts office in Scandinavia
- ► **Nemetschek Scia** will be present on the next IPHA conference on **10/05 in Brussels (BE)**
- ► **Nemetschek Scia** will be present on the Concrete 2010 Exhibition - **11/05 in Athena Conference Centre, Leicester (UK)**
- ► **Nemetschek Scia** will be present on the Tekla UK, Managers Day 2010 on **20/05 in Wakefield (UK)**
- ► **Nemetschek Scia** organises a four-day seminar "Eurocode in practice" in the Benelux.

- ► Read our **2 Solution Sheets** on "Design of concrete structures according to the Eurocodes" and "Design of prestressed concrete".
- ► **2010** is the year to switch to the **Eurocodes**. Read Scia's explanatory note on the Eurocodes.
- ► Scia invites you to participate in the **survey**: "Users of Software for Design and Engineering".
- ► Are you a **student or professor**? Download Scia Engineer for free today.

New Software Updates

- ► Customers can download the **latest service packs** from our secured download section.
  - **Scia Engineer 2010.0.314b**
  - **Scia Steel 2009 SP7**
  - **Allplan 2009-2**
  - **Allplan Precast 2008.2a2**
- ► Get an automatic notify through RSS when a **new Scia Engineer Service Pack** is available.

Training

- ► **Free** interactive eLearning.

- ► We offer group trainings for **Scia Engineer**, **Scia Geotechnics**, **Allplan**… Please consult our training agenda and register online…
- ► Interested in an individual customized training at your offices? Please contact Mrs. K. Verhille.
- ► Online training calendar 2010. Subscribe online...

Dear eNews reader, this month we present...

Nemetschek Scia launches a new website to support the move to the Eurocodes

Scia did some Eurocode surveys in the past and we could notice that our customers and partners are eager to get more profound and technical information about this norm that is becoming the standard in Europe.

To support the move to the Eurocodes, Nemetschek Scia is sponsoring and launching a new dedicated website - www.eurocodes-online.com - for current and future users of CAE applications distributed by Scia. Technical articles, up-to-date information on the Eurocodes in the different countries, examples of good practice, Q&A and much more are published here. This special website is available in English, other languages such as French, German, Finnish, ... will follow in the coming months. Scia encourages you to send us your feedback and are open to your input.

We are also happy to announce that Scia is starting with dedicated **Eurocode workshops and seminars** in all regions to train its users intensively in the aspects of practical structural design following the Eurocodes.

www.eurocodes-online.com

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Nemetschek Scia starts office in Scandinavia (FI)

Nemetschek Scia is expanding its activities in the Scandinavian region by establishing a representative office in Finland as of 1st May 2010. It is established at the location of **Vahanen oy**, a longstanding business partner of Scia and a well-known architectural-engineering firm in the region. Support and sales operations for Nemetschek Scia are set up from the office under the management of the Scia regional head of sales Mr. Jules van der Weide.

Scia is servicing several clients in and around Finland, among them Ruukki, Best-Hall oy, Ramboll Finland oy and Magnus Malmberg Consulting Engineers Oy.

Read more in our latest press release...

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The 2010 Pritzker Price for Architecture goes to Kazuyo Sejima and Ryue Nishizawa (Japan)

One of the most recent buildings of the price winning architects is the **Rolex Learning Centre** of the Ecole Polytechnique Fédérale in Lausanne (Switzerland). This remarkable shell type structure was engineered by BG Ingénieurs Conseils (Lausanne), the winner of the Nemetschek Engineering User Contest 2009 (category 5).

The jury quoted:" *the structure is an assembly of complex thin concrete shells providing a visually impressive functional arrangement requiring careful analysis at all stages during the construction. Scia Engineer was used both for non-linear and dynamic analysis and to simulate the removal of formwork stuts. The result is a facility that blends into the landscape."*

We express our **congratulations to BG Ingénieurs Conseils** for their success in supporting the prestigious Pritzker Price winners of 2010.

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Secondary school of Haut-Lac - Vouvry (CH)

The engineering office

The esm group consists of an integrated network of engineering offices, active at national and international level. The company was founded in 1997, it comprises four entities in Switzerland - Genève, Lausanne, La Tour-de-Peilz and Monthey. Today esm employs about forty staff members. The services offered by esm affect domains such as project studies, assessment, advice and research & development.

The project

It regards the new building of the intermunicipal secondary school of Vouvry. This construction of 3 levels is composed of 30 classrooms for general education, 2 kitchens, 2 classrooms for sciences, 5 rooms for artistic activities and 3 gymnasiums.

The structure of the building looks like a gigantic mushroom. The gym, the transit area and the adjacent technical classrooms make up the foot and around this base are arranged two floors, with a large overhang of 8.5m, with classrooms which make up the hat. Since the required bearing behaviour could not be realised before the whole structure was realised, the overhang acts as a mega-structure.

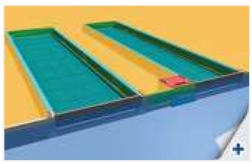
The tension ring in the roof deck has been stiffened by post-tensioned tendons in order to reduce the deflection caused by the overhang.
So as to limit the loads on the overhang, the floor slabs were kept of a minimum thickness and the ceilings of the ground floor are made out of wood. The floors are made of a lightweight bearing structure.

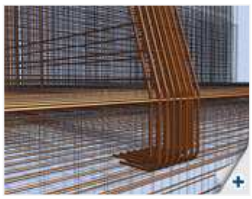
The coverage of the sports hall is a timber grid structure, complemented by elements made of OSB panels. This building meets the latest requirements for seismic resistance.

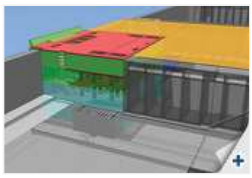
► Any questions? Put it on the **Scia Forum**! Register...

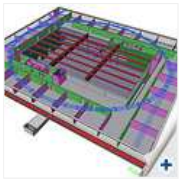
Software Gallery

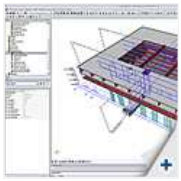
Thanks to DAEWOO E&C











Modelling

With Scia Engineer it was possible to integrate all characteristics of the project into the model: complex 3D megastructure, combination of materials (concrete, wood and steel), prestressing, pile foundations, soil-structure interaction… for a justification of all the elements of the building under static and seismic conditions.

A nice **Scia Engineer design movie** is available on Scia's Youtube Channel.

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Scia Engineer Tips & Tricks: dividing and joining of 2D members

A few of the new features in Scia Engineer 2010.0 are the joining and dividing of 2D members.

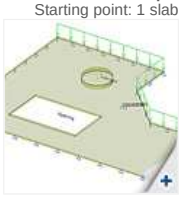
These functionalities were primarily meant to be used in the modelling phase of the project. At the moment they are only available in the case of flat 2D members; shells are not yet supported.

When dividing 2D members, different types of geometry are available for the cutting edge.
See the icons on the command line:

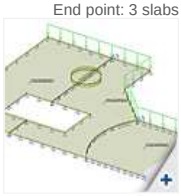
The original positions and properties of subregions and openings are maintained. Also the transfer of a number of additional data is supported. When e.g. a subregion is used as support, as illustrated in the example adjoining, this is transferred correctly to the new plates. Also the initial configuration of the line load on the edge is kept. It is however advisable to always check the new position of the loads. Attributes like concrete data are also copied to the new elements. Pay attention however when using internal nodes and edges; these data are removed when dividing the master 2D member. The joining of adjacent 2D members is at the moment less comprehensive than the previous feature: when using this option the user gets a specific warning that additional data will be removed during the action.

Another new option which can facilitate the working with 2D members is the '**Visibility selection mode**'. This option is de-activated by default, and a 2D member can only be selected by clicking on one of its edges. When this option is activated it is possible to select a rendered (!) 2D member by clicking somewhere on its surface.

Example
Starting point: 1 slab



End point: 3 slabs



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