

Update history

CDS v7.03

CDS 7.03.exe

Calculation core : More explicit error message in the case of invalid geometry for shear.

Graphical interface : Number of bars per bed limited to a minimum of 2 in explicit reinforcement.

Correction of the EXPOSITION command for passive steels, which was not taken into account.

CDS v7.02

CDS 7.02.exe

Calculation core: ELU bilinear deformation at failure epsilon_ud increased to comply with the Eurocode. Changes from eps_ud = 0.018 to eps_ud = 0.02 (see SETRA 2008 guide EC2 page 72).

Graphical interface: ELS equivalent coefficients for concrete added.

CDS v7.01

CDS 7.01.exe

Adding traction bounds for prestressing tendons at ELS FREQUENT and ELS QUASI PERMANENT. It is set similar to bounds at ELS CARA. It helps bounding the interaction diagram.

Correction to interaction diagrams computed during PHASAGE.

CDS v7.00

CDS 7.00.exe

Deployment of the CDS graphical interface (referred to as HMI for Human-Machine Interface).

The desktop icon allows opening the HMI with a double-click or launching a CDS calculation by dragging and dropping a command file. The ".xcds" files represent projects created from the HMI. The ".cds" files still exist, are still editable, and supported by the application, but cannot be directly read in the HMI.

CDS v6.43

CDS 6.43.exe

Defining a CONTOUR inside a CONTOUR is made possible.

Correction on error concerning criteria on the strain of prestressed cable as computed by the method « RETOUR_ETAT_ZERO ». Ensure consistency between the messages « equilibrium, but strain limits exceeded » and « out of bounds » in the arrays reporting stress. If strain or stress are out of bound, if option DEFORMATION NON BORNEE is activated in the justification, the design report contains H_Bornes but also the value of the stress, if an equilibrium has been found.

CDS v6.42

CDS 6.42.exe

Correction on error concerning strain exceeding the ultimate strain of prestressing cables. In calculation sheets, it is now signaled as « equilibrium, but strain limits exceeded » in addition to the « out of bounds » in the arrays reporting stress. The modification also affects interaction diagrams.

The steel material for rebars is now « NON CONFINE » as default.

The exposure class XF is removed from CDS. A XC or XD class must be specified for mechanical loadings.

CDS v6.41

CDS 6.41.exe

Modifying character size and drawing of reinforcements in SVG images

Highlighting « out of bond » in red in html.

CDS v6.40

CDS 6.40.exe

Adding MORPHOLOGIE and CISAILLEMENT to compute shear stress induced by shear force and torsion in section of boxes and steel profiles according to thin wall theory

Adding coordinates of points defining interaction diagrams when asked in JUSTIFICATION.

Adding the equation of the neutral axis.

CDS v6.35

CDS 6.35.exe

Adding option RETOUR_ETAT_0 IDENTIQUE/INSTANTANE to make use of the long term modulus or short term modulus of concrete under G+P+Q load. . Modifications to the solver of the dimensioning procedure so as to improve convergence.

CDS v6.34

CDS_6.34.exe

A bug preventing from tuning parameters of reinforcement steel and prestressing steel in ACCIDENTAL and SEISME situations is corrected.

CDS v6.33

- **CDS_6.33.exe**

The advanced parameter FISSURE_MAX wmax may be different between ELS_FRE and ELS_QP.

Adding CHARPENTE pour handle steel profiles and frames

Adding PHASEE, PHASE, ZONES_ACTIVES to handle section built step by step

For reinforced concrete only : a tensile strength fctm is accounted for as uncracked ELS are considered ELS_FRE_NF and ELS_QP_NF.

CDS v6.20

- * **CDS_6.20.exe :**

The advanced parameter FISSURE_MAX of material ACIER are now accounted for for simplified cracking (French national annex).

The advanced parameters of a PRECONTRAINTTE in the SITUATION EXPLOITATION SERVICE are now correctly accounted for.

CDS v6.10

- * **CDS_6.10.exe :**

Correction of minor bugs

CDS v6.01

- * **CDS_6.01_x.exe :**

Software refurbished

Eurocodes version – Command file