

ADAPT-PTRC 2019 Release Notes

December 2019

Feature Enhancements

This release of the program features major enhancements in productivity, scope, and accuracy.

The following is a summary of the principal enhancements:

Building Design Codes

Indian IS 456:2000 (Reaffirmed in February 2016) - RC
Indian IS 1343:2012 (Reaffirmed in November 2017) - PT

Design Classification for Indian Code (IS 1343)

Type 1: No Tensile Stress in Service Total and Sustained
Type 2 (v1): Allowable Tensile Stress for Service Sustained
and Total load combination – 3.0 MPa
Type 2 (v2): Allowable Tensile Stress for Service Sustained
load combination – 0.0 MPa
Allowable Tensile Stress for Service Total load
combination – 4.5 MPa
Type 3: Design based on cracked section. The design
values are taken from Table 10 based on the
concrete grade, modified by coefficients given in Fig.6, based on
the depth of the member.

Punching Shear Improvements

New improvements have been made for punching shear according
to ACI318-14. These include:

- The option to consider critical sections outside the shear
reinforced zone with either a rectilinear or octagonal-shaped
critical section. ACI318-14 Sections 22.6.4.2, 22.6.6.1
- The option to apply two-way shear provisions for minimum
reinforcement for seismic drift. ACI318-14 Sections 18.14.5.1.
- Application of minimum two-way shear reinforcement at
critical sections is based on the requirement at the first section
 $d/2$ from face of support.

Bug Fixes

This release includes corrected bugs and improvements over version 2018. A detailed description
is provided in the log file, **LOG_PT.txt**, located in the system folder where the program is installed.

ADAPT

Structural Concrete Software

Minimum System Requirements

32bit PC - Windows 7/Windows 8/Windows 10

64bit PC - Windows 7/Windows 8/Windows 10

Available hard drive space of 200 MB

RAM of at least 1 GB

Compatibility with Other ADAPT Products

ADAPT-Modeler 2018/2019 through Strip Export/Import Options

Available Documentation and Other Learning Resources

Program manuals:

ADAPT-PTRC 2019 User Manual

ADAPT-PTRC 2019 Verification Manual

Program Tutorials:

ADAPT-PTRC 2019 – PT Getting Started Tutorial

ADAPT-PTRC 2019 – RC Getting Started Tutorial

ADAPT-PTRC 2019 – PT Getting Started Guide (Indian Code)

Instructional Videos:

<https://www.youtube.com/playlist?list=PL378C6E38C601435A>

More Information

For up-to-date info on ADAPT software, go to:

<http://www.adaptsoft.com/updates>