

nVent RAYCHEM TraceCalc® Pro Version 2.17

Readme File

Welcome to nVent RAYCHEM TraceCalc® Pro, the industry standard for heat tracing design. nVent is devoted to delivering quality software and support to make this the best design tool available in the industry today. Your feedback is very important to us. Please feel free to contact us at thermal.info@nVent.com with questions, issues or suggestions for this program.

IMPORTANT: Please check our web site periodically to obtain the latest TraceCalc Pro news and updates.

This Readme covers the following topics:

- 1. Main New Features of Version 2.17**
- 2. Known Issues and Limitations**
- 3. System Requirements**
- 4. Installation**
- 5. Register for a Validation Code**
- 6. Technical Support**
- 7. Change History** (new features and fixed issues)

1. Main new features of version 2.17

- The recently introduced Raychem 20XTVR2-CT has successfully passed hazardous area approval testing to allow for an unconditional T3 rating up to a nominal supply voltage of 240Vac. This means that the Raychem 20XTVR2-CT is now unconditionally T3 rated up to 240 Vac and T2 rated up to 277Vac. This is applicable for all approvals schemes the product is certified to (IEC, NAM, CCC,...).
- The recently introduced High Power Retention (HPR) self-regulating heating cables, nVent RAYCHEM XTVR and HTV, are now CCC approved allowing them for use in hazardous area as per GB standard for China.
- The TraceCalc Pro attachment algorithm was modified to also include glass tape when aluminum tape is used, to better reflect actual installation practices when heating cables are installed using aluminum tape on pipes. We have given the user flexibility to specify the amount of glass tape to include on the design tab since the glass tape is used only as a temporary fixation aid.

2. Known Issues and Limitations

- For designs with European single conductor, polymer insulated (PI) series heater cables, the connection components selected by TraceCalc Pro have the following limitations:
 - a. For CS-150-xx-PI connection kits, the specific crimp size is not indicated in the bill of material. You will need to manually select the correct crimp based on data presented in the latest Technical Data Book.
 - b. For Power Tee or Power Splice configurations, a JB-EX-20 junction box will be selected by TraceCalc Pro; a JB-EX-21 should be substituted instead.
 - c. The last leg of a multi-segment Parent/Child design will include two single conductor segments and a junction box allowed for series connection of the two segments. At this point, TraceCalc Pro does not support a single looped cable as the last segment.

- d. TraceCalc Pro will not support the full application range of the universal connection and splice kit for PI heating cables, reference: CS-150-UNI-PI. Its maximum use temperature has been limited to 120°C for simplification of the selection algorithms. If the user plans to select the kit, it is important to verify the maximum allowed wattages for higher temperatures as detailed in our installation instructions (ref. Install-064). In case of doubt, please contact nVent or use the kit CS-150-2.5- PI instead.
- For European series cable designs, TraceCalc Pro will propose a bill of materials for which some components have the quantity set to zero. These are small electrical items required to create the desired electrical configuration and are compatible with the proposed junction box. Users should adjust the quantities of these components to ensure that the requested electrical configuration can be realized. Refer to the individual datasheets of the proposed junction boxes for more information on the exact contents and electrical limitations.

3. System Requirements

The TraceCalc Pro installation package no longer supports installation on Windows XP. Contact nVent for more information.

Minimum Requirements:

- Microsoft Windows 10 or later, Server 2012 or later
- At least 25 MB of free hard disk space
- **Internet Explorer 6.0 or later**
- Adobe Acrobat Reader 5.0 or later
- Recommended: 500 MHZ, 2 GB RAM

4. Installation

The program can be downloaded from our website. After downloading, just start the TraceCalc Pro 2.17 Setup.exe program and follow the instructions.

During installation, Setup will detect if an earlier version has been installed. If you have an earlier version installed, then Setup will uninstall it before continuing. All of your application settings will be retained. Old projects will not be removed and can be used with TraceCalc Pro 2.17.

5. Register for a Validation Code

When you install the TraceCalc Pro software, you are getting a trial version that will only function for 30 days, unless it is registered and a valid registration code entered.

The first time you launch TraceCalc Pro, you will be prompted to register. Register online through our public website. Once you register, we will send you the validation code. To enter the code, launch TraceCalc Pro, click **Register** on the main menu and type the code in the pop-up window.

6. Technical Support

For help using TraceCalc Pro, first check the extensive on-line help in the program.

- To contact your local nVent representative, visit our website, click on the 'Support' menu, then choose 'Where to Buy'

- To view Frequently Asked Questions, visit our website, click on the 'Support' menu, then choose 'Frequently Asked Questions (FAQ)'
- To contact Technical Support, send email to thermal.info@nVent.com and indicate your country and preferred language.
- To download the latest version of TraceCalc Pro or the user manual, go to the TraceCalc Pro page.

Thanks for reporting any issues to us.

7. Change history

Version 2.17

New	Recently launched nVent RAYCHEM XTVR and HTV that use HPR technology are now CCC approved
New	Recently launched nVent RAYCHEM 20XTVR2-CT now has an unconditional T3 rating up to 240Vac for all approval schemes to which the product is certified to.
New	To improve flexibility reflecting actual installation practices, the 'Design tab' allows to specify the pipe length interval to use to include additional glass tape when designs with aluminum tape are done.
Fixed	The max exposure temp of the mechanical thermostat with limiter type RAYCHEM T-M-20-S/0+200C/EX has been corrected to 230°C to deal with the limitations of the control sensor.
Fixed	The 'Register online' button (on the Register form) pointed to an obsolete URL and hence returned an error. This has been corrected to ensure it takes the user to the correct page on our website.
Fixed	When using Global Edit on the startup temperature, the SW would under specific circumstances erroneously not always update all lines.
Fixed	The warning "maximum segment length exceeded" was being raised unnecessarily on series cable vessel designs.
Fixed	On a vessel design using parallel heater technology, if the cable type was forced but the attachment type was not, the system sometimes applied an incorrect circuit length adjustment factor, resulting in an erroneously long reported maximum circuit length.
Fixed	HTV reported maximum heater lengths were sometimes shorter than actually allowed for design conditions.
Fixed	When installing a new version over a previous installation with different regional settings, a user's customized default project settings (which includes regional settings) are preserved, so the user does not get the (new) regional settings. Therefore a button that allows the user to replace his default project with the last-installed default regional settings has been added.