

**CRYO**

# Liquid Nitrogen Research Dewars

**SAMPLE  
IN  
VACUUM**



**CRYO Industries of America**  
[www.cryoindustries.com](http://www.cryoindustries.com)

# Thermal Link Sample in Vacuum

Many standard cryostats are available with an adjustable thermal link built into the liquid nitrogen reservoir. This link isolates the sample from the liquid nitrogen and allows super variable temperature operation from 77K to 325K (up to 800K optional). Temperatures below 77K can be reached by pumping on the nitrogen bath.

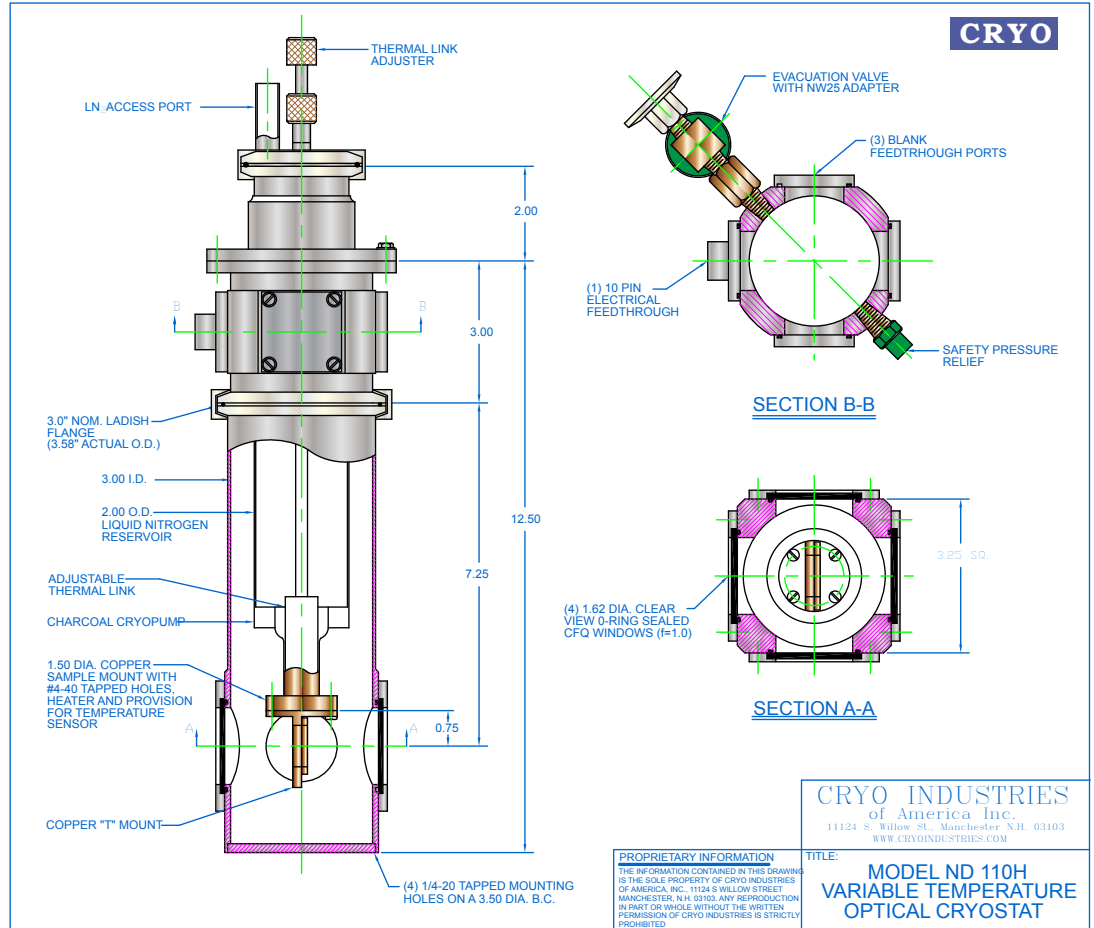
Cryo Industries includes as standard an exclusive thermal link design which allows variable cooling power, and re-filling of the cryostat reservoir without removing the thermal link or disturbing the temperature of your experiment. Virtually unlimited run time! Features of this design include:

- Cold finger (Sample in Vacuum)
- Very easy to operate
- No flow to control
- No capillary or flow line to plug
- No reservoir pressure regulation needed
- No exchange gas required
- Compact 'hand—held' dewars
- Variable temperature operation
- Cryo Exclusive variable cooling power thermal link design
- Stable temperatures
- Easy quick funnel filling
- Liquid nitrogen reservoir can be refilled without disturbing set point for a virtually unlimited hold time!
- Multiple cold fingers – operating simultaneously at different temperatures- can be installed in one cryostat
- Brings variable temperature to production work

Cryo Industries has over 25 years experience in designing and manufacturing Liquid Nitrogen Test Dewars. Innovative design has led to the development of an industry unmatched thermal link design for sample in vacuum LN2 dewars.

Cryo is able to custom design a system that will meet all of your experimental needs. You supply us with your experimental specifications and we provide you with a system that is guaranteed to meet those needs!

## Variable Temperature Pour Fill Liquid Nitrogen Cryostats: Sample in Vacuum Thermal Link Style



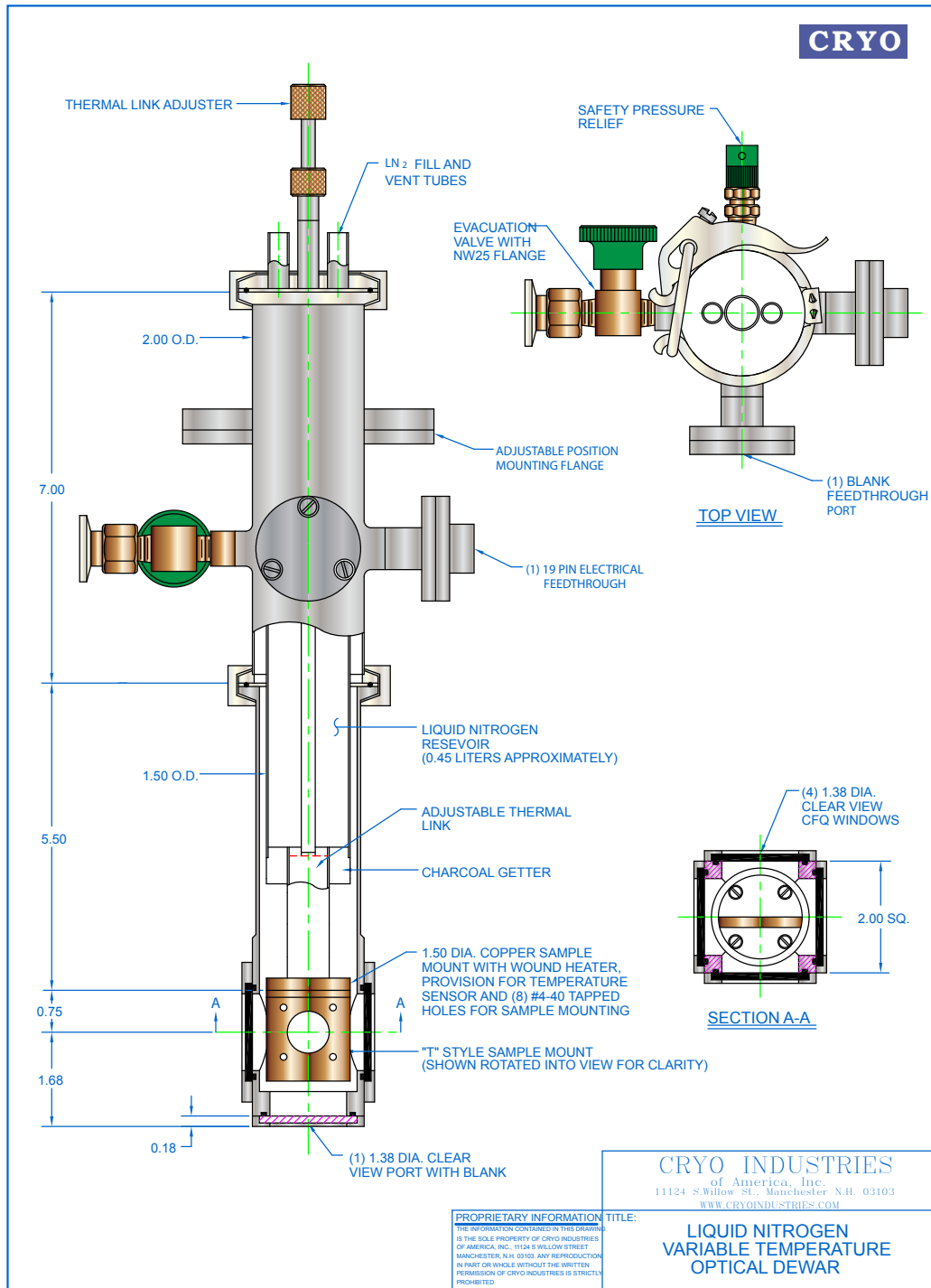
### System Features:

- 77 K to 325 K operating temperature range
- 0.4 liter liquid nitrogen capacity
- Easy to use thermal link design
- Vari-Power (VP = adjustable cooling power) a CRYO exclusive feature
- Pour fill the LN2 reservoir while holding setpoint temperature - virtually unlimited runtime
- Compact hand-held style
- Vacuum shroud with 3.25" square bottom section with (4) optical 1.62 inch diameter clear view CFQ suprasil window ports

### Instrumentation header with:

- (1) 10-pin electrical feedthroughs
- (3) Blank feedthrough ports
- Safety pressure relief
- Evacuation valve with NS25 (ISO-KF 25) interface
- Copper optical 'T' style holder with 5mm diameter hole
- 1.50" diameter sample mount with 50 ohm hi-power heater
- PT-100 Platinum temperature sensor installed in sample mount
- Complete system test
- One year warranty

## Compact Variable Temperature Pour Fill Liquid Nitrogen Cryostats: Sample in Vacuum Thermal Link Style



### System Features:

- ~65K to 325K operating temperature range (Temperatures below 77K require optional pumping setup)
- Unique thermal link variable temperature- easiest-to-use, high temperature stability, fast thermal response
- 1/4 liter liquid nitrogen reservoir capacity
- 0.75 inch (19 mm) OD vacuum shroud tail section
- 50 ohm Hi-power control heater installed on sample mount cold finger
- 19-pin electrical feedthrough with mate
- Nitrogen fill and vent ports
- Thermal link adjuster
- Vari-Power (VP) Thermal link insert
- Re-fill LN2 while holding setpoint temperature -virtually unlimited runtime
- Evacuation valve with safety pressure relief
- Copper style optical sample holder with 5 mm dia. hole
- Platinum Temperature Sensor installed on copper sample mount and tested

*This compact 'hand-held' cryostat is a smaller version of our most popular model!*