

# **NAVIGATOR**

# Reflow Oven Set Up Lower Electricity Use – Improve Production Quality

#### Description Optimization General Original PWI: Best PWI: Speed Change: Total Setpoint Change: 170% -10.8 inches/minute 142 Celcius Search Mode: Allow Zone Setpoints to Change Maximize Conveyor Speed Allow Conveyor Speed to Change **Minimize Energy Consumption** eyor Speed Constraints: PWI Goal: 50 % **Apply Changes** \_\_\_100

## Navigator Power Advantages

- Reduce Energy Costs
- Enable Deep in Spec Profiler
- Maximize Product
   Throughput
- 24 Hour Customer Service



Thermal
Process
Set Up
Tool for
Lower
Electricity
Use

#### **Technology for Lower Electricity Use**

Navigator Power selects the best oven recipe based on user selected criteria:

- Minimum electricity use
- Deep in spec profile
- Maximized throughput
- Minimized oven changeover time

Where do the energy savings come from?

- Most reflow ovens are set up without considerations of electricity use
- Reflow ovens tend to run too hot and too fast
- Software simulation identifies the oven recipe that will yield the lowest electricity use based on the above criteria

When will the electricity savings be realized?

Instantly

### **Case Studies**

Several case studies reveal a typical electricity saving of approximately 15%

Go to www.kicthermal.com to read the actual case studies

# What is required to achieve the electricity savings?

- Knowledge of the appropriate process window
- One initial profile run with TCs on the product
- Knowledge of minimum allowable reflow oven conveyor speed
- KIC Navigator Power and a KIC profiler
- Nothing else

#### **Ease of Use Software**

- Most profiling tasks are automated and run invisibly in the background
- The user interface enables the responsible engineer to select the higher level criteria such as process window and minimum conveyor speed
- Everything else can be delegated
- The ease of use software means faster oven set up and lower production downtime

**Technical Support** 24 Hours Every Day **Everywhere** 

#### Risk Free Guarantee

All KIC products are designed to give maximum value and fast payback by streamlining your thermal process. Investment in a KIC product is a step toward total process control and quality management. All KIC products come with a no questions asked, 30 day money back guarantee.

For more information on any of our products or service please visit us on the Web at: www.kicthermal.com or www.kic.cn.

#### Service Available

**Technical Support** Installation and Setup **Application Support** Hardware Support **Guaranteed Warranty** 

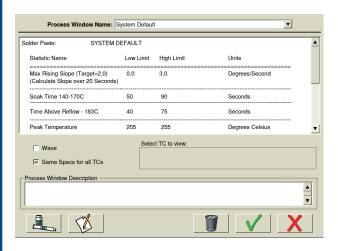
## **NAVIGATOR**

KIC Navigator Power™ expands the capability and potential of the KIC software by automatically optimizing your process set up.

KIC Navigator Power™ is a stand-alone software option and is also included with the KIC Auto-Focus Power<sup>™</sup> software option.

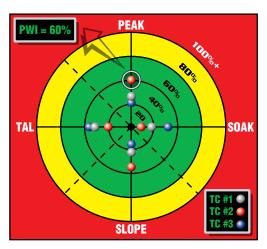
Note: The KIC software may interface directly with some oven controllers, eliminating the need for manual setpoint data entry. Please consult your oven supplier for availability.

KIC software is dongle protected.



Edit the Process Window Screenshot

## THE PROCESS WINDOW INDEXTM



#### **Profiling Reduced to a Single Number**

The PWI measures the profile's fit to the process window in a mathematical and objective manner by using a single number. This aids in optimizing the process by comparing and ranking alternative profiles in terms of their fit to the available process window. The lower the PWI, the more efficient and stable the process! (See the PWI data sheet for a detailed explanation)

#### COMPUTER CONFIGURATION

#### **Minimum System Requirements**

Dual Core / 1 GHz Processor PC with 2 GB RAM 2 GB available storage Video 1024 x 768 resolution / 16-bit 1 available USB port (for software key) Visit our website at http://kicthermal.com/supportdownload/os-compatibility-chart for product compatibility with Windows operating systems.



When KIC Software is running on a computer with other applications, a faster CPU and more RAM may be required.

#### Corporate Headquarters

16120 West Bernardo Drive • San Diego, CA 92127 USA +1(858)673-6050 Phone • +1(858)673-0085 FAX sales@kicmail.com • tech@kicmail.com

**European Regional Office** 

europe.sales@kicmail.com • europe.tech@kicmail.com

Asian Regional Office

asia.sales@kicmail.com • asia.tech@kicmail.com

kicthermal.com

kic.cn



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Rev 1602A