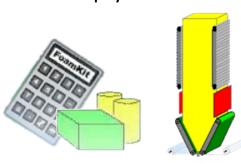
# FoamKit 4000

## Formulation and process software for flexible polyurethane foam



Advanced software package for Microsoft Windows - compatible with Windows XP, Vista, Windows 7, Windows 8

### FoamKit 4000 calculations

Foam properties - density, hardness, tensile, elongation, compression set Effect of atmospheric and process conditions on foam properties

Pump outputs Mix temperature and viscosity

Rise time and full rise position

Foam block peak exotherm temperature

## FoamKit 4000 will also....

Suggest a formulation for a given density and hardness Suggest activator levels - amine and tin catalyst, silicone surfactant

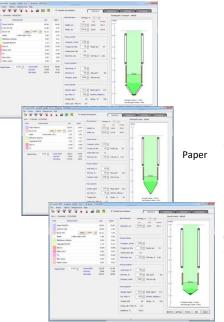
## FoamKit software

- used worldwide
- large and small



## For all types of vertical foaming

## Can be configured as......



Inclined V conveyors bottom feed (Vertifoam process)

Polyethylene film Rectangular and round block

Profiled steel bottom feed (Vertifoam process)

Rectangular block

Conical steel bottom feed (eg. Chinese process)

Polyethylene film

Round block

## Variable pressure and froth systems

FoamKit 4000 can simulate variable pressure machines and froth dispense systems (using carbon dioxide and low boiling hydrocarbons).

## Interactive graphics

The foam process graphic is matched to the foam expansion profile. Full rise position is indicated and percentage post-divergent expansion is calculated.

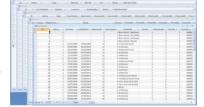
## **FoamKit**

## FoamKit 4000 database - the heart of FoamKit 4000

A Microsoft Access database is used to store all your data......

Formulation records Process data Chemical data Machine data

There is virtually no limit to the size of this database. It expands to contain as much information as



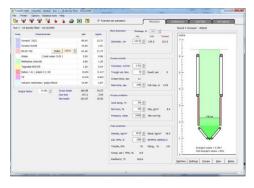
needed. Huge capacity for formulations and all other records.

Now includes database password protection option - for added security.

# Formulation and process

This is the main page for working with a formulation.

The program works in the same way as you would set up your foam machine. First load a formulation record. Formulation pph values



can be adjusted. The output factor determines the pump outputs for each stream. Conveyor speed is calculated and set for block dimensions and foam density. Foam properties are calculated for the formulation and displayed.

Process conditions - temperature, pressure and humidity - can all be set.

Add any chemical from the chemical lists to the formulation table.

#### Chemicals

Chemicals are organised in groups......

oups.....

Polyols

Isocyanates

Blowing agents
Silicone surfactants

Amine catalysts

Tin catalysts

Colour and pigments

Filler powder dispersions

Fire retardants



Process additives

Chain extenders and cross-linkers

Plasticisers

Miscellaneous (anti-static additives, anti-scorch, etc.)

Property of each chemical can be displayed - supplier, activity, viscosity, price, etc.

Chemicals can be added to the database, edited and removed as required. There is no limit to the number of chemicals that can be added to any chemical group.

## Up to 25 chemical streams

The formulation table expands as you add a chemical. Capacity is up to 25 chemical streams.



## **FoamKit**

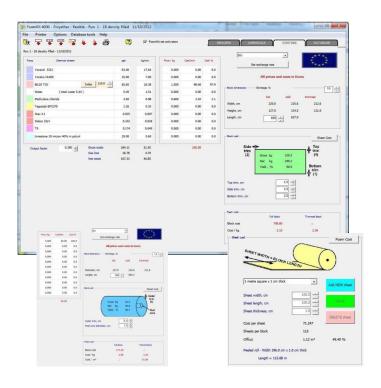
## Costing

FoamKit 4000 calculates.....

Mix cost per kg and per minute run

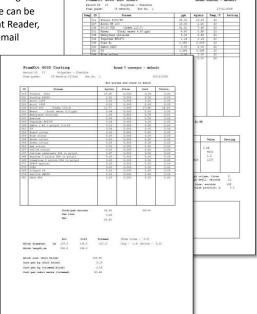
Foam block cost - full block and after trimming  $\;\;$  Sheet cost - calculate for your size of sheet

Select your own currency for the costing from the country list



## Print run sheets and costing sheets

Print Run Sheets and Costing Sheets as pdf documents. These can be viewed in Adobe Acrobat Reader, printed, saved, sent as email attachments.



## Use pdf files as a formulation record

When you make changes to a formulation, this is saved in the FoamKit 4000 database as a formulation record.

The pdf Run Sheet files also contain all your formulation information - you can load a formulation from the pdf file. This offers a convenient way to send a formulation to another FoamKit 4000 user - email the pdf file to them and they can load your formulation from the file.